WATER SUPPLY OUTLOOK
and
FEDERAL - STATE - PRIVATE COOPERATIVE SNOW SURVEYS
for
COLORADO and NEW MEXICO

UNITED STATES DEPARTMENT of AGRICULTURE···SOIL CONSERVATION SERVICE
and
COLORADO AGRICULTURAL EXPERIMENT STATION,
STATE ENGINEER of COLORADO
and STATE ENGINEER of NEW MEXICO

Data included in this report were obtained by the agencies named above in cooperation with the Bureau of Reclamation, U.S. Forest Service, National Park Service and other Federal, State, and private organizations.

AS OF
MAR. 1, 1962

UNITED STATES DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE

To Recipients of Cooperative Snow Survey and Water Supply Forecast Reports:

The climate of the cultivated and populated areas of the West is characterized by relatively dry summer months. Such precipitation as occurs falls mostly in the winter and early spring months when it is of little immediate benefit to growing crops. Fortunately, most of this precipitation falls as mountain snow which stays on the ground for months, melting later to sustain streamflow during the period of greatest demand during late spring and summer. Thus, nature provides in mountain snow an imposing water storage facility.

The amount of water stored in mountain snow varies from place to place as well as from year to year and accordingly, so does the runoff of the streams. The best seasonal management of variable western water supplies results from fore-knowledge of the runoff.

A snow survey consists of a series of about ten samples taken with specially designed snow sampling equipment along a permanently marked line, about 1000 feet in length, called a snow course. The use of snow sampling equipment provides snow depth and water equivalent values for each sampling point. The average of these values is reported as the snow survey measurement for a snow course.

Snow surveys are made monthly or semi-monthly beginning in January or February and continue through the snow season until April, May or June. Currently more than 1400 western snow courses are measured each year. These measurements furnish the key data for water supply forecasts.

By relating snow survey measurements taken over a period of years to spring-summer runoff during the same period, relationships have been developed which make it possible to forecast seasonal runoff several months in advance of occurrence. In order to make a forecast, once a forecast relationship has been developed, the maximum snow water content at previously selected key snow courses is usually entered in the forecast relationship. More accurate forecasts are often obtained when other factors such as soil moisture, base flow and spring precipitation are considered and included in the forecast relationships.

Listed below are the Federal-State-Private Cooperative Snow Survey and Water Supply Forecast reports available for the West which contain detailed information on snow survey measurements, streamflow forecasts, reservoir storage, soil moisture and other guide data to water management and conservation decisions.

PUBLISHED BY SOIL CONSERVATION SERVICE

REPORTS	ISSUED	LOCATION	COOPERATING WITH
RIVER BASINS			
Colorado and State of Utah	Monthly (Jan.-June)	Salt Lake City, Utah	Utah State Engineer and Other Agencies
Columbia	Monthly (Jan.-May)	Boise, Idaho	Idaho State Reclamation Engineer
Upper Missouri and State of Montana	Monthly (Feb.-June)	Bozeman, Montana	Mont. Agr. Exp. Station
West-Wide	Oct. 1, Apr. 1, May 1	Portland, Oregon	All Cooperators
STATES			
Alaska	Monthly (Mar.-May)	Palmer, Alaska	Alaska S.C.D.
Arizona	Semi-Monthly (Jan.15 - Apr.1)	Phoenix, Arizona	Salt R. Valley Water Users Assoc. Ariz. Agr. Exp. Station
Colorado and New Mexico	Monthly (Feb.-May)	Fort Collins, Colorado	Colo. Agr. Exp. Station Colo. State Engineer N. Mex. State Engineer
Idaho	Monthly (Feb.-May)	Boise, Idaho	Idaho State Reclamation Engineer
Nevada	Monthly (Jan.-May)	Reno, Nevada	Nevada Dept. of Conservation and Natural Resources - Division of Water Resources
Oregon	Monthly (Jan.-June)	Portland, Oregon	Ore. Agr. Exp. Station Oregon State Engineer
Washington	Monthly (Feb.-June)	Spokane, Washington	Wn. State Dept. of Conservation
Wyoming	Monthly (Feb.-June)	Casper, Wyoming	Wyoming State Engineer

Copies of these various reports may be secured from:

Head, Water Supply Forecasting Section
Soil Conservation Service
P.O. Box 4170, Portland 8, Oregon

PUBLISHED BY OTHER AGENCIES

REPORTS	ISSUED	AGENCY
British Columbia	Monthly (Feb.-June)	Comptroller, Water Rights Br., Dept. of Lands and Forests, Parliament Blog., Victoria, B.C., Canada
California	Monthly (Feb.-May)	Calif. Dept. of Water Resources, Sacramento, Calif.

FEDERAL-STATE COOPERATIVE

SNOW SURVEYS AND WATER SUPPLY FORECASTS

for

COLORADO RIVER, PLATTE RIVER ARKANSAS RIVER AND RIO GRANDE DRAINAGE BASINS

Issued

March 1, 1962

Report Prepared By
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United States Department of Agriculture
Soil Conservation Service
and
Colorado Agricultural Experiment Station
Fort Collins, Colorado
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State Engineer of Colorado
Denver, Colorado
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General Series Paper No. 766
Colorado Agricultural Experiment Station

WATER SUPPLY OUTLOOK FOR COLORADO AND NEW MEXICO
as of
MARCH 1, 1962

* *
* MANY PARTS OF COLORADO PRESENTLY HAVE A SNOW *
* PACK THAT IS APPROACHING A MAXIMUM OF RECORD. *
* SNOW COVER IN ALL THE MOUNTAIN AREAS OF COLORADO *
* AND NEW MEXICO IS AVERAGE OR ABOVE. ON THE *
* BASIS OF THE FOLLOWING SNOW DATA THE WATER *
* SUPPLY OUTLOOK WILL BE NORMAL TO MUCH ABOVE *
* NORMAL FOR THE TWO STATES THIS SEASON. *
* *

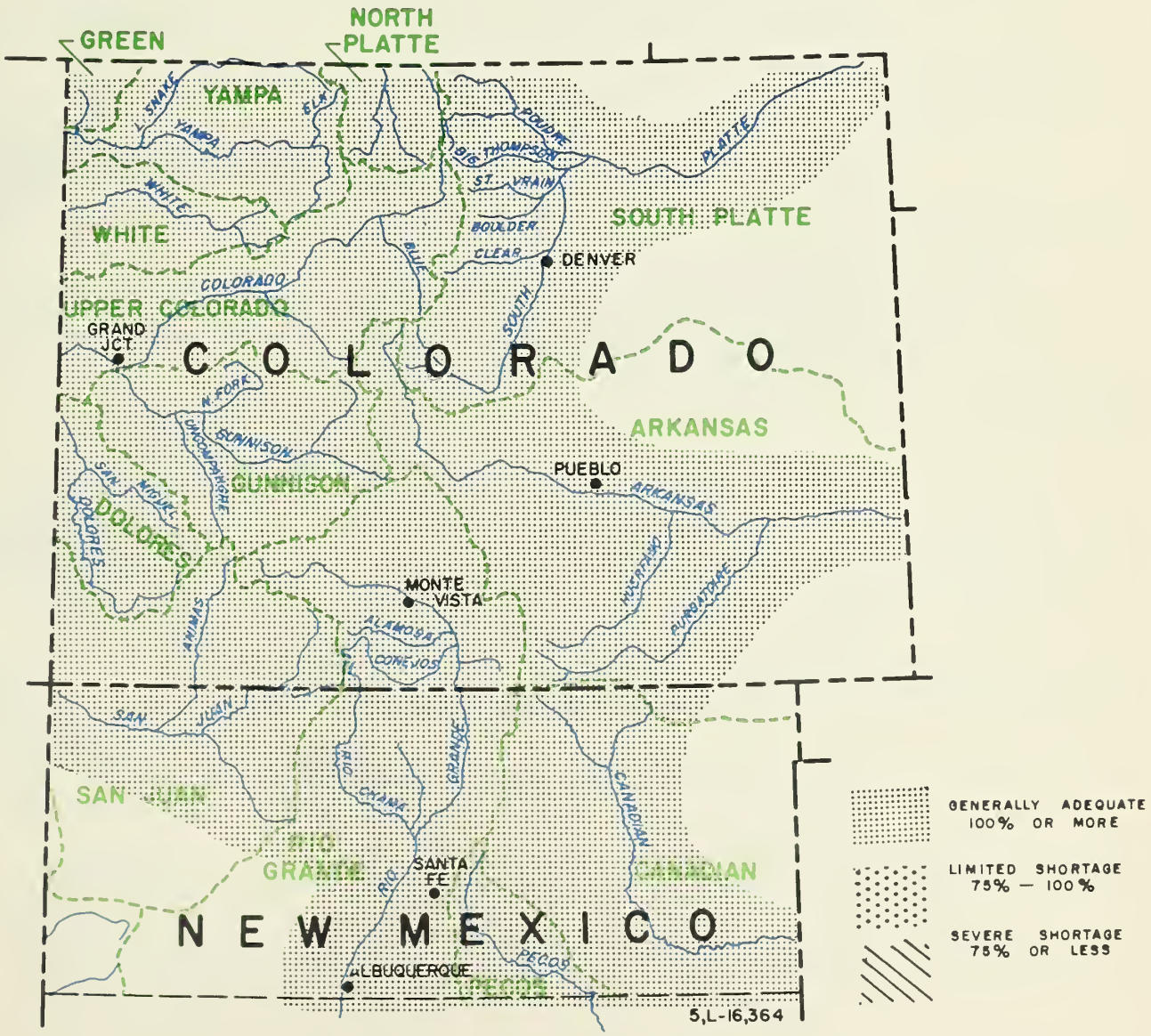
Colorado should enjoy one of the best water years it has had in recent history. To date, we have had much above normal precipitation. Watershed soils under the mountain snow pack were almost completely "recharged" by the above normal fall and early winter rains. This above normal precipitation has continued through into the winter months leaving a near record snow pack in many areas of the State. Reservoir storage is better than last year, and many reservoirs are full or expected to fill before the spring season.

Short water supplies have almost become a way of life for the area of New Mexico served by the Rio Grandeand its tributaries. This year, however, we can expect some relief from this situation. If the remaining one-fourth of the snow season offers normal or above precipitation, this area will have a better water supply than any time in recent years.

Areas served by the San Juan, Pecos and Canadian Rivers are in excellent condition, and are assured of a good water supply this season.

WATER SUPPLY OUTLOOK

THE MAP ON THIS PAGE INDICATES THE MOST PROBABLE WATER SUPPLY AS OF THE DATE OF THIS REPORT. ESTIMATES ASSUME AVERAGE CONDITIONS OF SNOW FALL, PRECIPITATION AND OTHER FACTORS FROM THIS DATE TO THE END OF THE FORECAST PERIOD. AS THE SEASON PROGRESSES ACCURACY OF ESTIMATES IMPROVE. IN ADDITION TO EXPECTED STREAMFLOW, RESERVOIR STORAGE, SOIL MOISTURE IN IRRIGATED AREAS, AND OTHER FACTORS ARE CONSIDERED IN ESTIMATING WATER SUPPLY. ESTIMATES APPLY TO IRRIGATED AREAS ALONG THE MAIN STREAMS AND MAY NOT INDICATE CONDITIONS ON SMALL TRIBUTARIES.



USDA SCS LINCOLN NEBR 1961

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WATER SUPPLY OUTLOOK BY MAJOR WATERSHED AREAS

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

SOUTH PLATTE RIVER WATERSHED IN COLORADO

as of
March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

Water content of the mountain snowpack varies from slightly below normal at low elevations to 160% of average at higher elevations. This season's "snow crop" averages 127% of normal for the entire South Platte watershed. The warming temperatures experienced during the middle of February, caused some snow melt at the lower elevations resulting in a decrease over last month on many snow courses. All of the South Platte tributaries from North to South have about equal snow cover.

SOIL MOISTURE

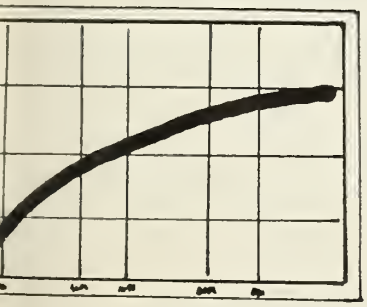
Watershed soils under the mountain snows are nearly saturated. This area had above normal Fall precipitation which resulted in very good soil moisture going into the winter season. Valley soils are also reported to be in excellent condition.

RESERVOIR STORAGE

Water held in storage on the upper South Platte River and tributaries is better than last year and about 140% of normal. Many reservoirs are full or expected to fill before the start of the irrigation season.

This storage will be an excellent supplement to the anticipated spring runoffs.

EXPECTED STREAMFLOW



The South Platte River and all its tributaries will flow better than average this season. This above average streamflow coupled with excellent reservoir storage, and above normal soil moisture will assure water users of excellent supplies this summer season.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

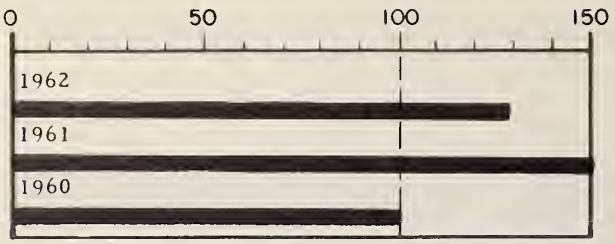
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist, Colorado

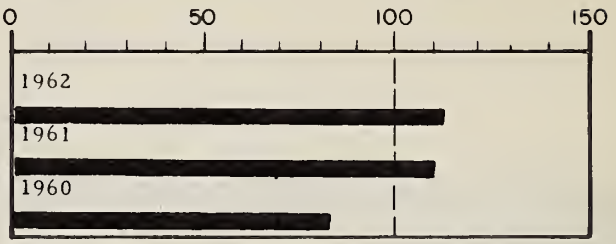
R. G. Wilson, Area Conservationist, Littleton, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

CACHE LA POUDRE - BOULDER



CLEAR CREEK - UPPER SOUTH PLATTE



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Antero	33.0	15.7	15.5	14.2
Barr Lake	32.2	22.0	25.8	19.9
Black Hollow	8.0	4.8	2.2	3.2
Boyd Lake	44.0	4.1	34.6	18.1
Cache La Poudre	9.5	8.4	5.3	6.2
Carter Lake *	108.9	93.1	74.1	63.7
Chambers Lake	8.8	7.3	1.7	1.7
Cheeseman	79.0	78.5	59.7	47.6
Cobb Lake	34.3	20.4	12.8	5.5
Eleven Mile	81.9	97.8	97.8	69.3
Fossil Creek	11.6	7.6	7.6	6.6
Gross	43.1	34.8	17.4	--
Halligan	6.4	4.4	3.4	1.9
Horsetooth *	143.5	128.2	98.8	88.0
Lake Loveland	14.3	7.9	7.7	5.8
Lone Tree	9.2	7.8	5.0	5.6
Mariano	5.4	4.8	4.0	2.2
Marshall	10.3	6.8	1.9	1.6
Marston	18.9	15.5	5.3	14.2
Milton	24.4	14.0	15.3	9.7
Standley	18.5	14.3	8.8	9.6
Terry Lake	8.2	5.9	4.2	4.3
Union	12.7	Delayed	8.5	6.7
Windsor	18.6	13.3	9.1	8.1

MEASURED FIRST OF MONTH

* Shorter Period.

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Alpine Camp	7.0	4.2	0.5	1.7
Beaver Dam	6.0	3.3	0.7	1.5
Feather	6.0	2.9	0.0	1.3
Guard Station	7.0	4.6	0.7	1.4
Hoop Creek	6.0	5.4	0.5	2.4
Hoosier Pass	7.0	6.9	0.9	2.9
Kenosha Pass	7.0	4.2	0.4	—
Laramie Road	7.0	6.0	0.8	2.6
Two Mile	8.0	5.8	0.5	3.3

ALL PROFILES 4 FEET DEEP

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	AUGUST THROUGH NOVEMBER DEP.	WINTER Dec-Jan AVE.	WINTER Dec-Jan DEP.
Upper South Platte	8.07	+3.71	1.42	+.39

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

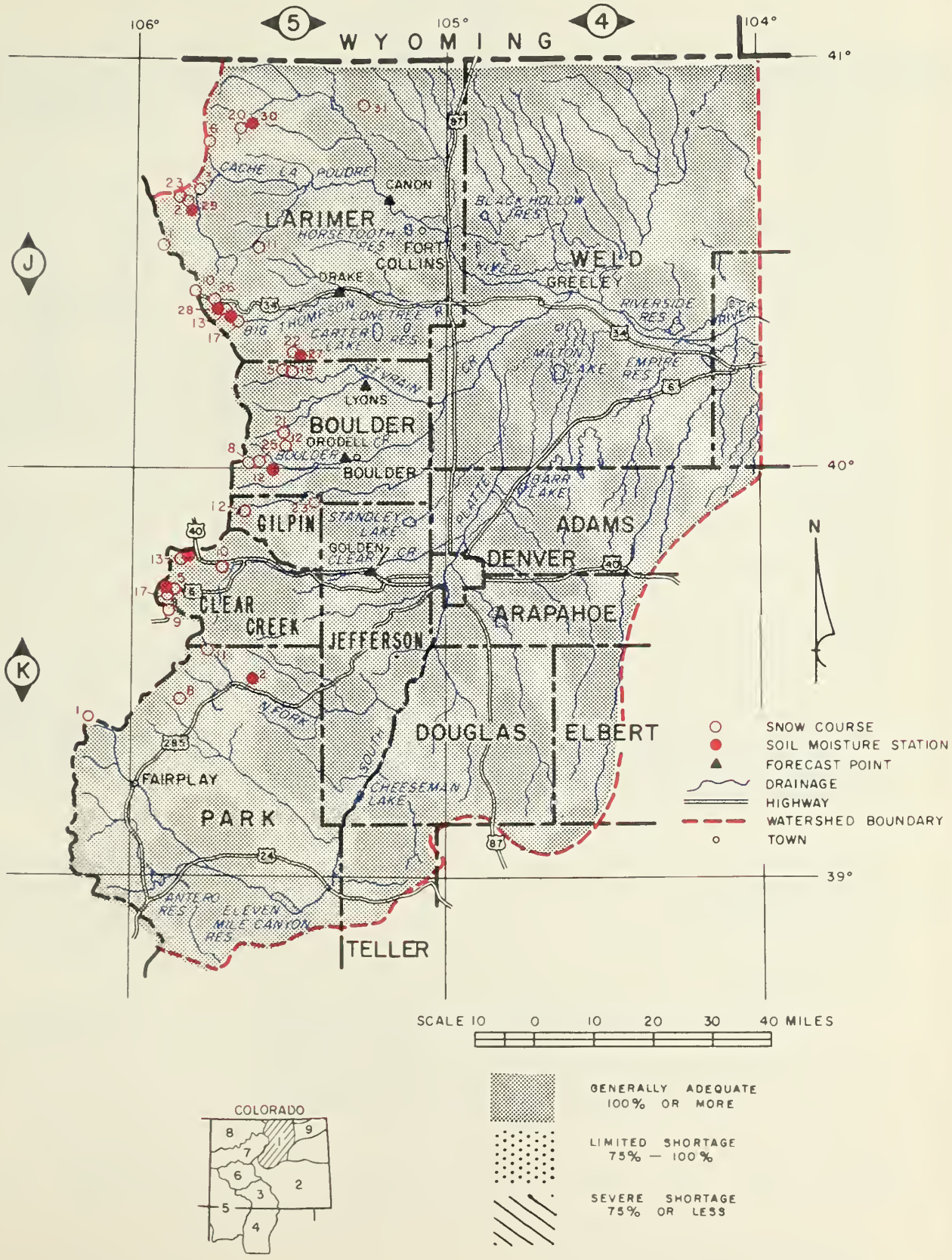
STREAMFLOW FORECAST (1,000 AC. FT.)

APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Big Thompson at Drake (2)	134	126	106
Boulder at Orodell	70	127	55
Cache La Poudre at Canon(1)	225	120	189
Clear Creek at Golden (3)	190	139	137
Saint Vrain at Lyons	115	137	84

(1) Observed flow minus diversions from Michigan, Colorado and Laramie rivers, plus diversions for irrigation and municipal use above station.
(2) Observed flow plus by-pass to power plants.
(3) Observed flow minus diversions through Jones Tunnel.

SOUTH PLATTE RIVER WATERSHED IN COLORADO



SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
SOUTH PLATTE RIVER AND TRIBUTARIES						
Baltimore	5K23	2/27	33	9.4	5.8	--
Berthoud Falls	5K13	2/27	55	15.9	9.2	11.8*
Big South	5J3	3/4	11	2.5	0.9	2.2
Boulder Falls	5J25	2/26	46	6.6	6.4	10.3*
Cameron Pass (A)	5J1	Delayed			14.8	18.0
Chambers Lake	5J2	3/4	38	10.3	4.1	7.0
Copeland Lake	5J18	2/27	16	2.7	3.3	4.9*
Deadman Hill (A)	5J6	Delayed			8.1	12.2
Deer Ridge	5J17	2/26	35	8.0	2.0	4.9*
Empire	5K10	2/27	36	10.0	4.7	5.0*
Geneva Park	5K11	2/28	20	4.3	1.4	3.8*
Grizzly Peak (B)	5K9	2/26	67	19.1	7.3	14.9
Hidden Valley	5J13	2/25	53	13.0	6.1	9.4
Hoosier Pass	6K1	2/27	49	13.5	7.0	10.0
Hour Glass Lake	5J11	3/2	29	7.1	3.3	6.6
Jefferson Creek	5K8	2/26	43	11.0	4.3	7.5
Lake Irene (B)	5J10	Est.	80	26.0	8.6	18.6
Long's Peak	5J22	2/24	38	9.4	5.6	10.1*
Lost Lake	5J23	3/4	51	15.1	5.8	10.4*
Loveland Pass	5K5	2/28	54	16.3	8.1	12.5
Loveland Lift No. 1	5K24	2/26	91	27.1	12.7	--
Pine Creek	5J31	2/27	12	1.8	2.2	--
Red Feather	5J20	2/27	32	6.8	5.3	6.9
Two Mile	5J26	2/25	69	19.0	6.1	11.9*
University Camp	5J8	2/26	62	20.6	10.8	17.7
Ward	5J21	2/26	24	5.9	4.8	5.6*
Wild Basin	5J5	Est.	65	18.4	5.8	11.9

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

ARKANSAS RIVER WATERSHED IN COLORADO

as of

March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

Snow pack as of March 1 is better than it has been for some years. The basin as a whole is 160% of normal for this date. High and low snows are both above normal. Some of the low elevation snow is as much as 200% of normal.

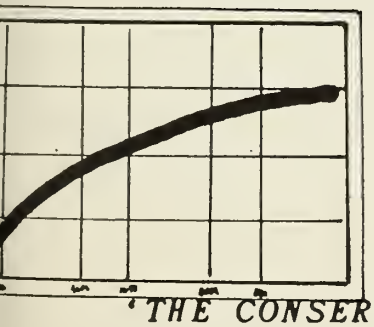
SOIL MOISTURE

Soil moisture is above normal. This will increase runoff this coming summer.

RESERVOIR STORAGE

Carry-over storage is still slightly below normal, but over twice as good as last year. The Arkansas has been flowing above normal most of the winter. This has contributed some storage.

EXPECTED STREAMFLOW



Water supplies this summer are assured on the Arkansas River. Current forecasts are for about 170% of normal. This has only been exceeded a few times in recent years. Flow of the Purgatoire and Cucharas should both be above normal.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

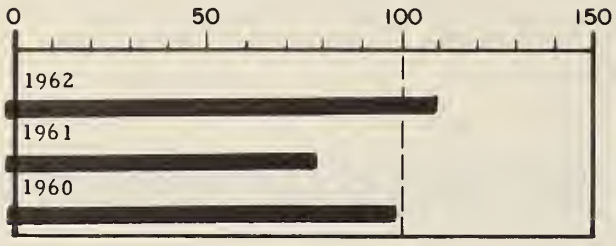
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist,
Colorado

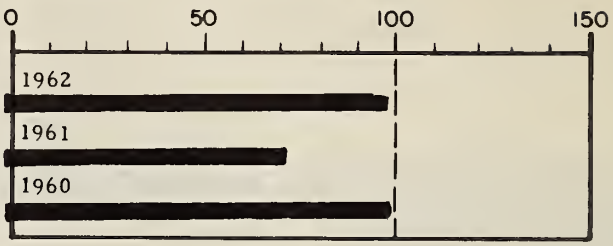
Dearl B. Beach, Area Conservationist,
Colorado Springs, Colorado
Will D. McCorkle, Area Conservationist,
Lamar, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

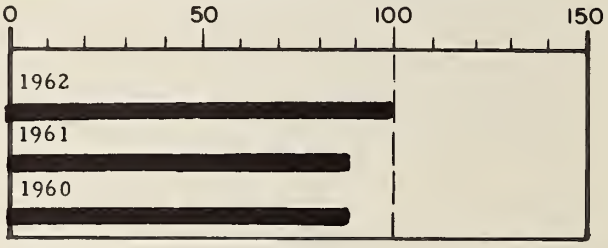
ARKANSAS ABOVE CADDOA DAM



ARKANSAS BELOW CADDOA DAM



PURGATOIRE - CUCHARAS - HUERFANO



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Adobe Creek	61.6	0	0	21.6
Clear Creek	11.4	10.4	5.5	5.0
Cucharas	40.0	7.3	1.8	4.7
Great Plains	150.0	36.8	22.6	51.3
Horse Creek	26.9	11.4	0	7.4
John Martin	366.6	27.0	15.5	52.6
Meredith	41.9	24.3	6.0	14.4
Model	15.0	5.1	4.3	2.5
Sugar Loaf	17.4	10.7	6.5	7.7
Twin Lakes	57.9	30.2	9.3	23.0

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER AVE. Dec-Jan	DEP.
Arkansas	8.36	+3.49	1.93	+.62

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Garfield	7.0	4.6	3.4	4.3
King	8.0	5.5	2.6	5.4
Lake Creek	6.0	4.1	1.6	3.4
LaVeta Pass	8.0	4.2	7.2	3.3
Leadville	7.0	3.8	0.6	1.5

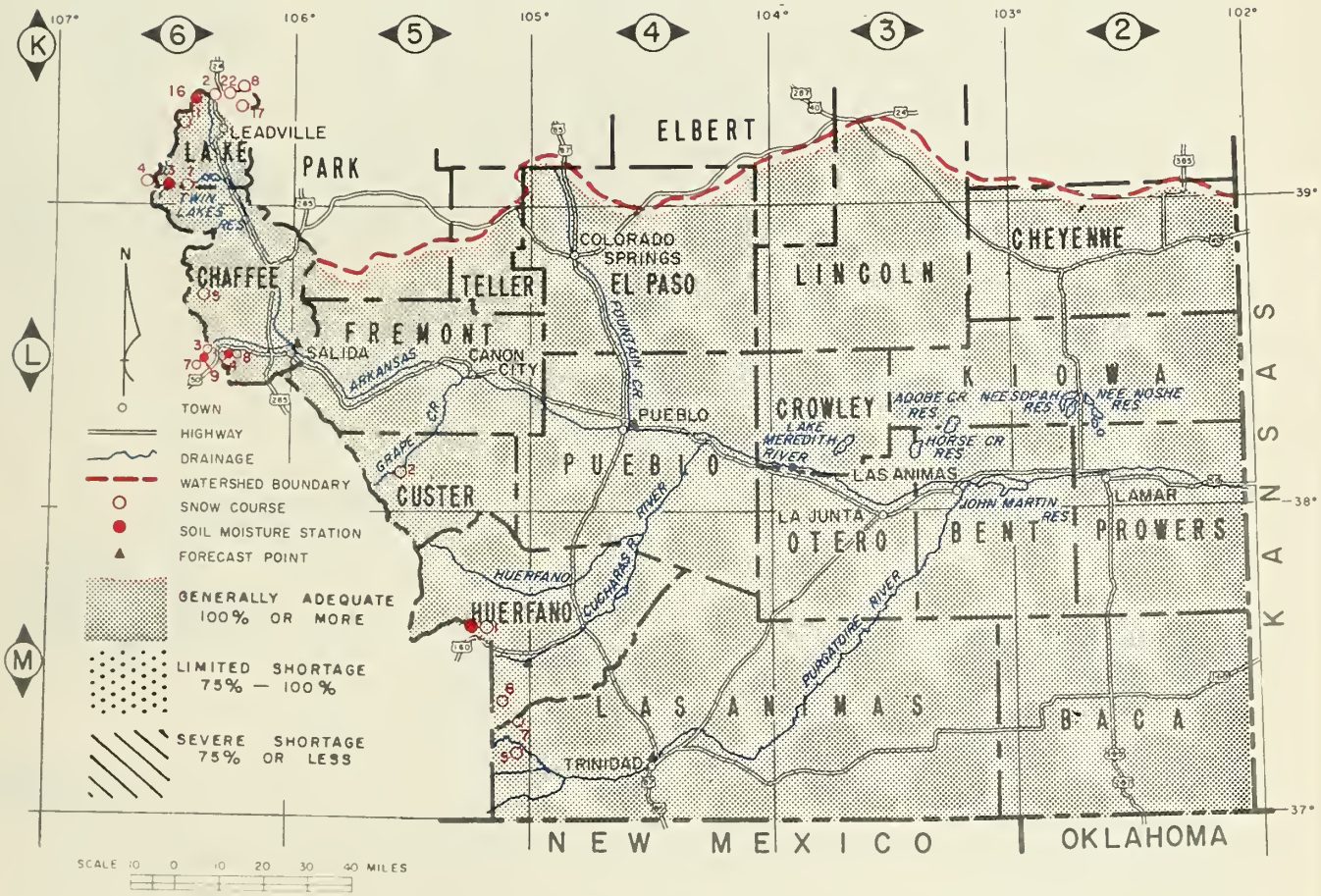
ALL PROFILES 4 FEET DEEP

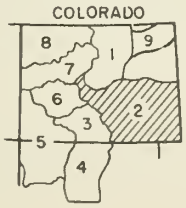
STREAMFLOW FORECAST (1,000 AC. FT.
APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Arkansas at Pueblo (1)	580	170	342
Arkansas at Salida (1)	575	169	339
Cucharas near LaVeta	19	136	14
Purgatoire at Trinidad	54	104	52

(1) Observed flow plus change in storage in Clear Creek, Twin Lakes, and Sugar Loaf Reservoirs minus diversions through Busk-Ivanhoe and Twin Lake Tunnels and Ewing, Fremont Pass, Wurtz and Columbine Ditches.

ARKANSAS RIVER WATERSHED IN COLORADO





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SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
ARKANSAS RIVER						
Blue Lakes	5M6	2/26	13	3.9	--	--
Bigelow Divide	5L3	2/28	27	5.9	--	--
Bourbon	5M5	2/27	38	9.1	5.2	--
Cooper Hill	6K23	2/25	54	11.9	6.4	--
Cucharas Pass	5M7	NS	--	--	--	--
East Fork	6K17	2/27	43	10.0	4.2	8.9*
Four Mile Park	6K7	2/26	38	9.7	3.6	3.7
Fremont Pass	6K8	2/27	68	18.2	7.4	13.2
Garfield	6L8	2/26	58	17.0	9.9	--
LaVeta Pass (B)	5M1	2/26	33	9.1	6.6	8.4
Monarch Pass	6L4	2/26	73	21.6	12.6	14.9
St. Elmo (A)	6L5	2/26	70	19.6	8.7	10.1*
Tennessee Pass	6K2	2/26	54	11.7	4.8	7.9
Tomichi	6L7	2/26	51	13.6	7.2	--
Twin Lakes Tunnel	6K3	2/26	53	16.9	4.3	8.9
Westcliffe	5L2	2/27	31	7.3	5.1	5.4*

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
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Ft. Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

UPPER RIO GRANDE WATERSHED IN COLORADO

as of

March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

This basin is divided between excellent snow cover to just above average. The Rio in Colorado, Alamosa, Conejos basins all have about 140% of average snow cover, while the small streams of the Sangre De Cristo Range have just above normal snow pack. Warm temperatures during February melted some of the snow at the lower elevations.

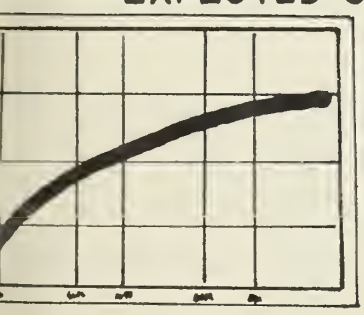
SOIL MOISTURE

Soil in this area normally goes into the winter months fairly well saturated. The only station in this basin that does not indicate good soil moisture is near the town of Mogote. Overall soil moisture is near average.

RESERVOIR STORAGE

Hold over storage in the reservoirs in this basin is just normal, but much better than last year at this time. These reservoirs will be a good supplemental supply this coming irrigation season.

EXPECTED STREAMFLOW



As the snow pack indicated, all streams, except those originating in the Sangre De Cristos, will flow above normal. At this time, the main stem of the Rio Grande is expected to flow about 150% of normal. The other extreme is the Culebra which will flow just about average. Most areas should have sufficient water for irrigation this summer.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

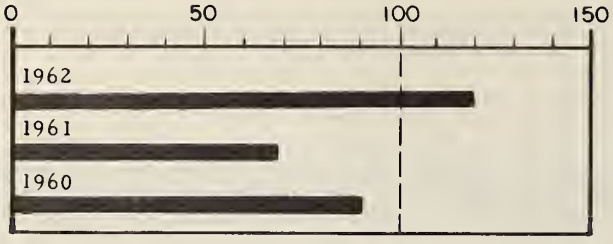
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist, Colorado

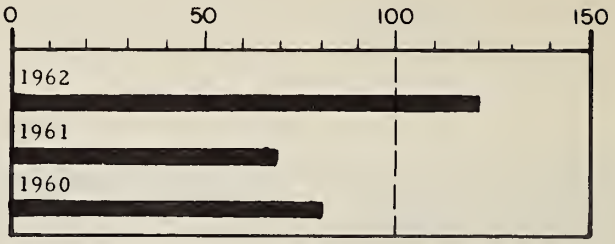
Benny Martin, Area Conservationist, Monte Vista, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

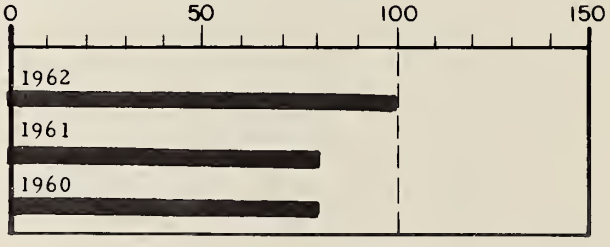
RIO GRANDE



ALAMOSA - CONEJOS



SANGRE DE CRISTO STREAMS



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Continental	26.7	5.7	4.4	7.3
Platoro	60.0	3.4	4.0	4.7
Rio Grande	45.8	11.1	6.3	11.1
Sanchez	103.2	12.2	6.5	9.6
Santa Maria	45.0	3.6	2.7	7.5
Terrace	17.7	7.5	2.3	2.6

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER Dec-Jan AVE.	DEP.
Rio Grande (Colo.)	8.26	+3.74	.59	-.28

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Alberta Park	9.0	4.1	1.1	3.3
Bristol View	7.0	3.9	6.7	3.6
LaVeta Pass	8.0	4.2	7.2	3.3
Mogote	7.0	2.1	1.8	1.5

ALL PROFILES 4 FEET DEEP

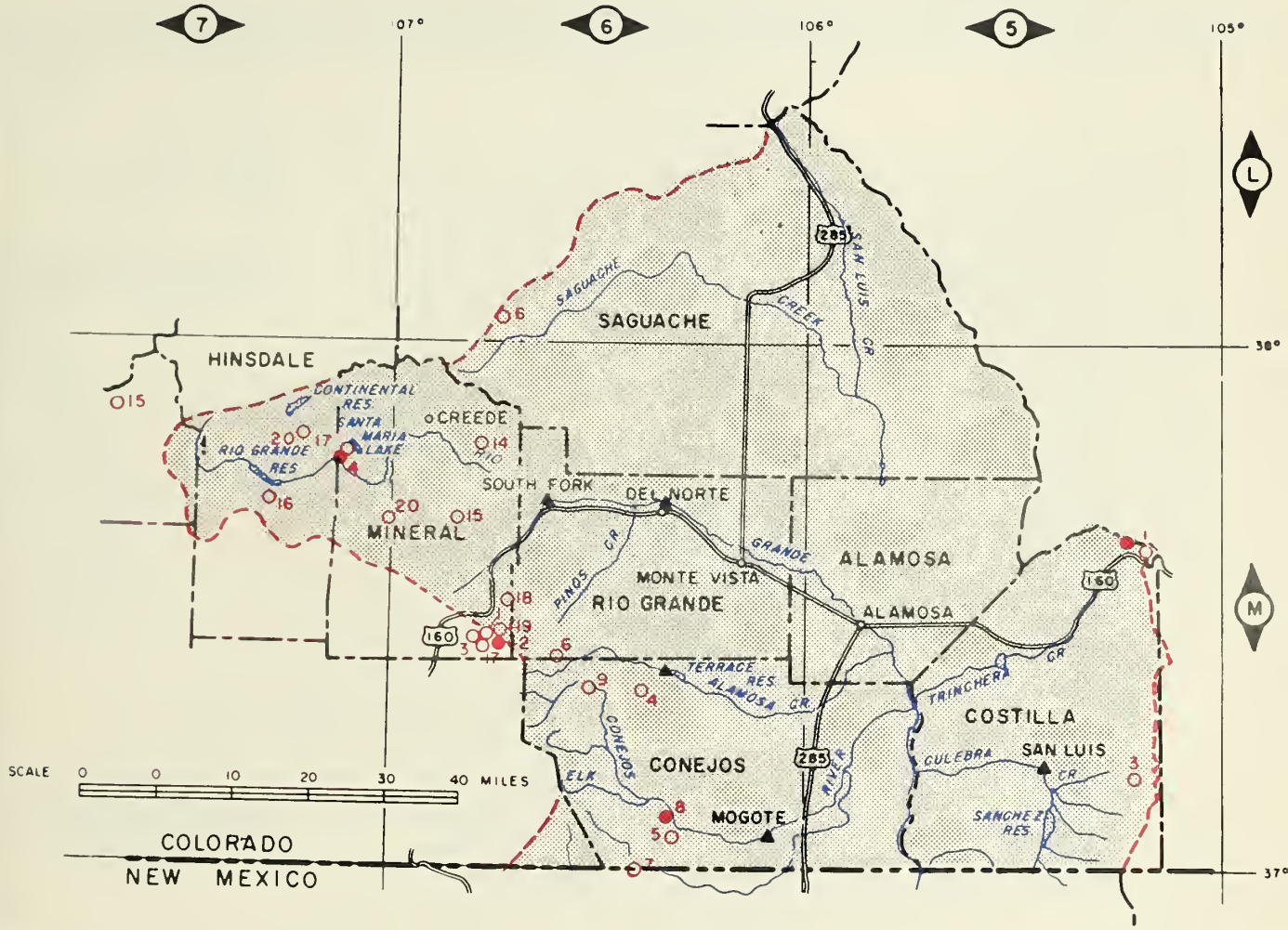
STREAMFLOW FORECAST (1,000 AC. FT.)

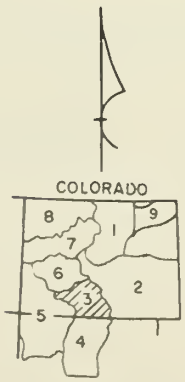
APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Alamosa above Terrace	92	130	71
Conejos near Mogote	255	129	197
Culebra at San Luis (2)	25	104	24
Rio Grande nr.Del Norte(1)	675	137	491
Rio Grande at Thirty Mile Bridge (1)	155	138	112
South Fork at South Fork	152	126	121

(1) Observed flow plus change in storage in Santa Maria, Rio Grande, and Continental Reservoir
(2) Observed flow plus changes in storage in Sanchez Reservoir.

UPPER RIO GRANDE WATERSHED IN COLORADO





- SNOW COURSE
- SOIL MOISTURE STATION
- FORECAST POINT
- DRAINAGE
- HIGHWAY
- WATERSHED BOUNDARY
- TOWN

- GENERALLY ADEQUATE 100% OR MORE
- LIMITED SHORTAGE 75% — 100%
- SEVERE SHORTAGE 75% OR LESS

USDA SCS LINCOLN NEBR 961

SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
RIO GRANDE IN COLORADO						
Cochetopa Pass	6L6	2/26	26	5.6	5.3	4.8*
Hiway	6M19	3/1	95	28.7	8.8	--
Lake Humphreys	6M15	NS	--	--	3.4	6.2*
Pass Creek	6M18	2/28	64	16.8	3.4	--
Pool Table (A)	5M14	3/1	38	9.5	3.8	4.8*
Porcupine (A)	7M20	3/1	62	16.1	4.1	9.0*
Red Mountain Pass (B)	7M15	2/28	103	34.2	16.4	22.5*
Santa Maria	7M17	2/27	34	7.3	1.4	4.7
Upper Rio Grande	7M16	2/27	49	11.2	4.9	6.8
Wolf Creek Pass	6M1	3/1	104	32.9	9.8	25.4
Wolf Creek Summit (B)	7M17	2/28	112	32.4	11.3	24.7*
ALAMOSA RIVER						
Silver Lakes	6M4	2/23	40	10.0	4.2	6.2
Summitville (A)	6M6	3/1	81	21.9	10.9	16.2
CONEJOS RIVER						
Cumbres Pass (A)	6M7	3/1	76	23.9	9.8	16.8
Platoro (A)	6M9	3/1	72	19.6	NS	14.4*
River Springs	6M5	2/26	41	9.3	3.6	7.4
SANGRE DE CRISTO RANGE (Colo.)						
Blue Lakes (B)	5M6	2/26	13	3.9	--	--
Cucharas Pass (B)	5M7	NS	--	--	--	--
Culebra	5M3	2/28	39	9.0	6.3	8.7
LaVeta Pass	5M1	2/26	33	9.1	6.6	8.4

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft. Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

RIO GRANDE WATERSHED IN NEW MEXICO

as of

March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

Snow cover over the Rio Grande Basin in New Mexico is spotty. Some areas are considerably above normal while others are below the 15-year average. The headwaters area of the Rio Grande is much above normal. Snowpack on the Canadian and Pecos Basins is above normal.

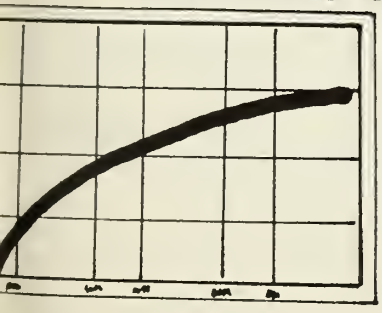
SOIL MOISTURE

Soil moisture, as indicated in the February bulletin, is much better than last year, but only about normal. Soil moisture conditions in New Mexico probably will not have much affect on runoff this summer. Valley soils are reported as good.

RESERVOIR STORAGE

Carry-over storage was again diminished last year. Elephant Butte now contains 405,000 acre feet compared to 428,000 acre feet last year. Reservoirs on the Pecos and Canadian drainages again this year have good supplemental storage.

EXPECTED STREAMFLOW



Most of the streams in New Mexico are expected to flow above normal. Inflow to El Vado should be about 250,000 acre feet, while the main stem of the Rio Grande should flow nearly 1,000,000 acre feet at Otowi. Using the 15-year, 1943-57 average, the Rio Grande at San Marcial should flow about 175% of normal. Using the Elephant Butte Irrigation District average, this percentage is only 109% of average.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

ISSUED BY: SOIL CONSERVATION SERVICE

Courtney A. Tidwell, State Conservationist,
New Mexico

H. M. Cavett, Area Conservationist,
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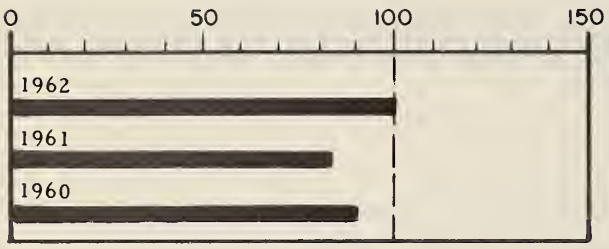
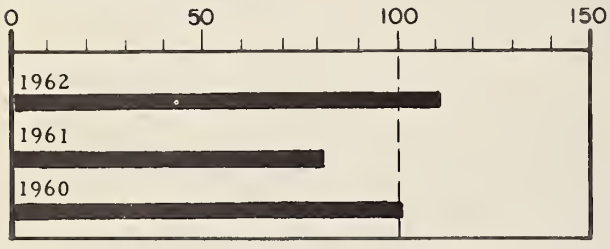
WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

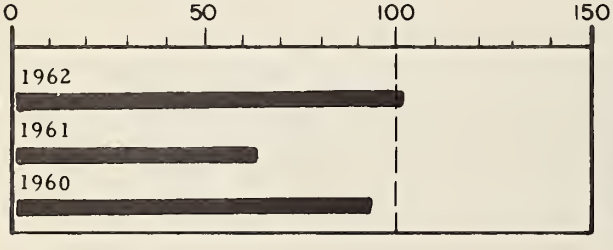
RIO CHAMA



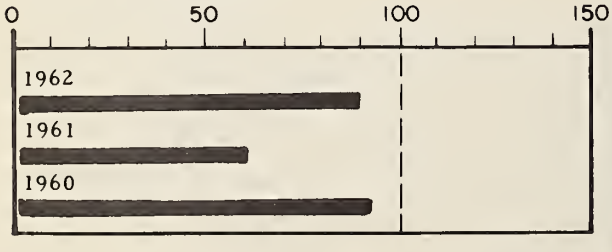
UPPER RIO GRANDE



MIDDLE RIO GRANDE



LOWER RIO GRANDE



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Alamorgordo	122.1	116.0	122.1	55.4
Caballo	344.0	71.0	73.8	170.4
Elephant Butte	2206.8	405.3	427.7	606.6
El Vado	194.5	2.6	2.6	34.9
McMillan-Avalon	44.5	16.0	43.0	13.4
Red Bluff (Tex)	307.0	63.3	131.0	91.7
Conchas	600.0	279.4	279.4	262.5

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER Dec-Jan AVE.	DEP.
Lower Rio Grande	5.52	+1.84	1.10	+.31
Middle Rio Grande	9.05	+2.72	2.37	+.15
Upper Rio Grande	8.26	+3.74	.59	-.28

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

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STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Alberta Park (Colo)	9.0	4.1	1.1	3.3
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Red Summit	4.8	0.4	0.2	2.2
Rio En Medio	3.5	2.0	0.1	1.2
Taos Canyon	3.3	2.5	0.6	1.4

ALL PROFILES 4 FEET DEEP

STREAMFLOW FORECAST (1,000 AC. FT.

APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Costilla at Costilla	25	93	27
Pecos at Pecos	75	156	48
Rio Chama nr. La Puenta	275	131	210
Rio Grande at Otowi (10)*	1000	158	633
Rio Grande at San Marcial (10)*	760	175	434

Rio Grande at San Marcial is Forecast at 109% of the Elephant Butte Irrigation District's Normal.

(10) Observed flow plus changes in storage in Santa Maria, Rio Grande, Continental, Terrace, Sanchez, Platoro and El Vado Reservoirs.

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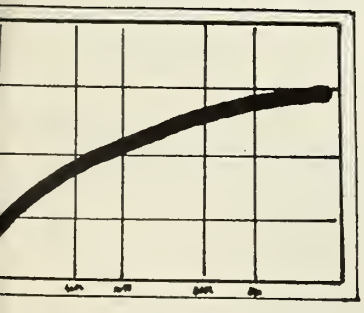

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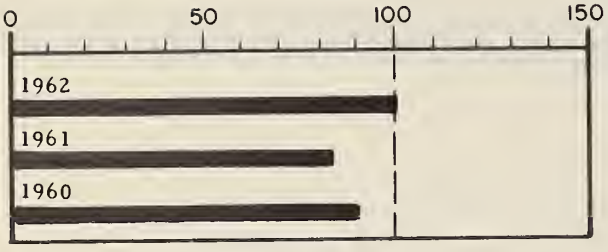

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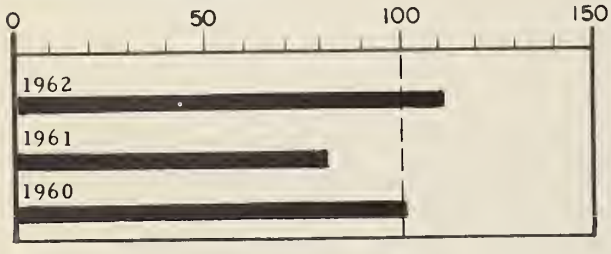

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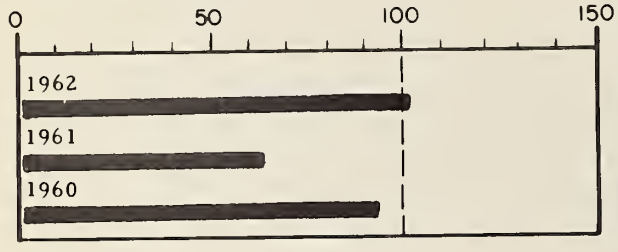
Mogote (Colo)	7.0	2.1	1.8	1.5
Red Summit	4.8	0.4	0.2	2.2
Rio En Medio	3.5	2.0	0.1	1.2
Taos Canyon	3.3	2.5	0.6	1.4

ALL PROFILES 4 FEET DEEP

MIDDLE RIO GRANDE



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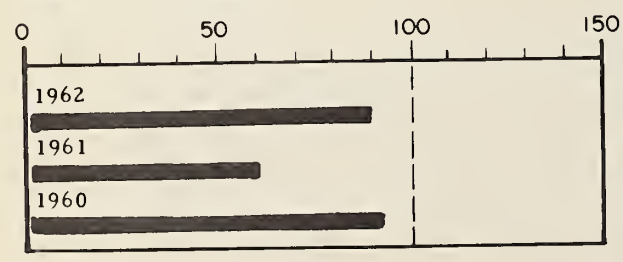

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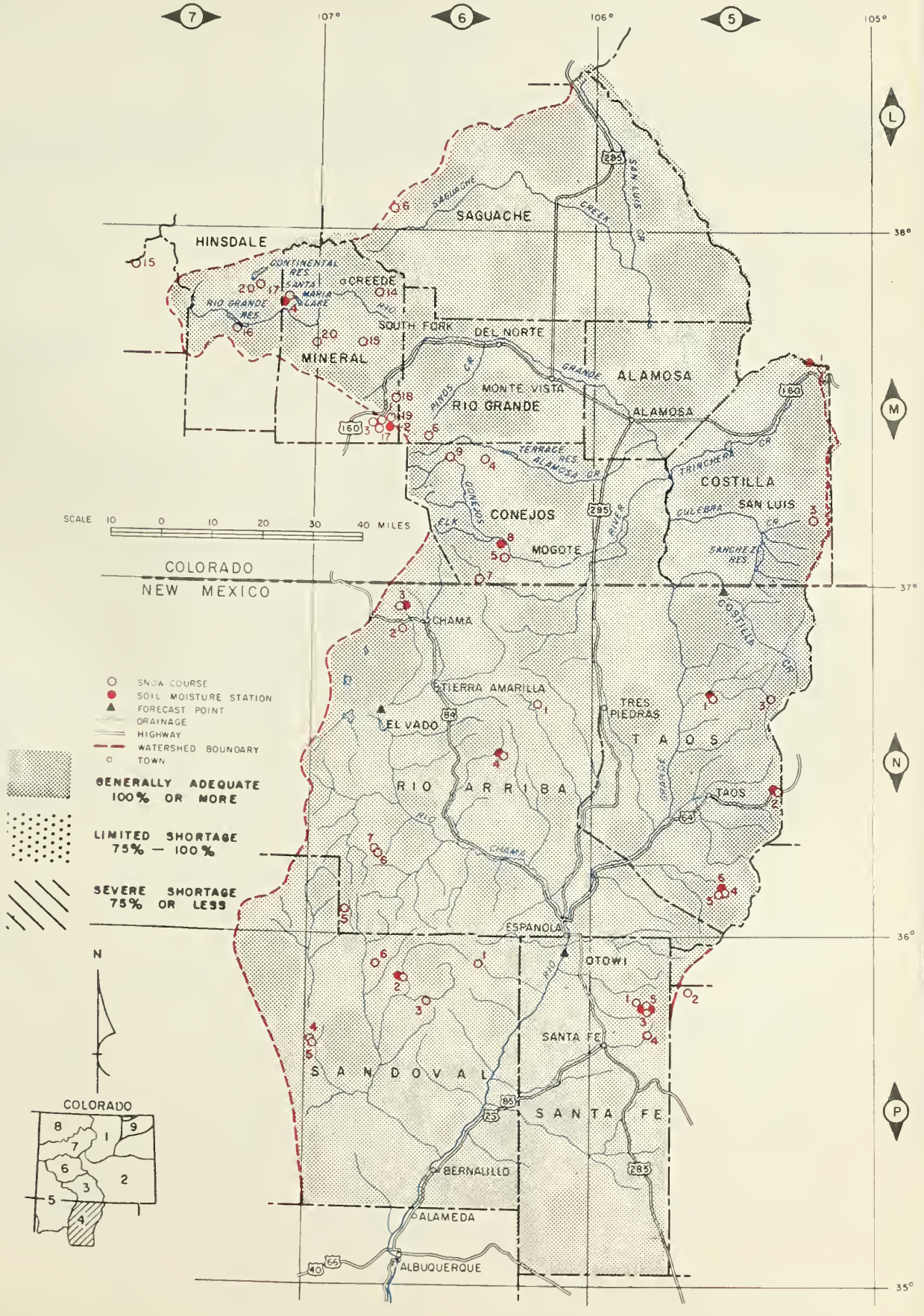
RIO GRANDE WATERSHED IN NEW MEXICO



USDA SCS LINCOLN NEBR (16)

SNOW

SNOW COURSE RIO GRANDE (COLORADO & NEW MEXICO)	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
Cochetopa Pass (Colorado)	6L6	2/26	26	5.6	5.3	4.8*
Culebra	5M3	2/28	39	9.0	6.3	8.7
Cumbres Pass (A)	6M7	3/1	76	23.9	9.8	16.8
Hiway	6M19	3/1	95	28.7	8.8	--
Lake Humphreys	6M15	NS	--	--	3.4	6.2*
LaVeta Pass	5M1	2/26	33	9.1	6.6	8.4
Pass Creek	6M18	2/28	64	16.8	3.4	--
Platoro (A)	6M9	3/1	72	19.6	NS	14.4*
Pool Table (A)	6M14	3/1	38	9.5	3.8	4.8*
Porcupine (A)	7M20	3/1	62	16.1	4.1	9.0*
River Springs	6M5	2/26	41	9.3	3.6	7.4
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Wolf Creek Pass	6M1	3/1	104	32.9	9.8	25.4
Wolf Creek Summit	6M17	2/28	112	32.4	11.3	24.7*
Aspen Grove (New Mexico)	5P1	2/26	32	9.7	2.4	4.1
Bateman	6N4	2/28	50	12.4	7.8	9.7*
Big Tesuque	5P3	2/26	23	6.8	2.6	4.7
Chama Divide	6N2	2/26	17	4.0	3.0	4.4
Chamita	6N3	2/26	44	9.0	5.8	9.3
Cordova (A)	5N5	3/1	51	14.8	7.9	9.5
Elk Cabin	5P4	2/26	10	3.8	3.8	3.1*
Fenton Hill	6P2	2/27	23	4.5	4.3	3.7*
Hematite Park	5N3	3/1	22	3.0	4.9	5.6
Panchuela	5P2	2/27	21	5.7	2.9	3.3
Payrole (A)	6N1	3/1	43	9.9	6.2	8.4
Quemazon	6P1	2/26	40	11.0	9.3	5.8*
Red River	5N1	3/1	32	5.8	4.8	6.9
Rio En Medio	5P5	2/26	32	9.7	6.5	6.8*
Taos Canyon	5N2	3/1	16	5.0	3.6	5.5
Tres Ritos	5N4	2/26	16	4.7	5.4	5.8

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

RETURN IF NOT DELIVERED

UNITED STATES
DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE
Snow Survey
Colorado State University
Ft. Collins, Colorado

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U.S. DEPARTMENT OF AGRICULTURE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE
SAN MIGUEL - DOLORES - ANIMAS - SAN JUAN WATERSHEDS IN COLORADO & NEW MEXICO

as of
March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

The snow pack in this area has improved since February 1, and is now sufficiently high to assure a good water year.

The snow cover over these basins ranges from 128% of normal on the Dolores to 133% of the 1943-57 average on the Animas watershed.

SOIL MOISTURE

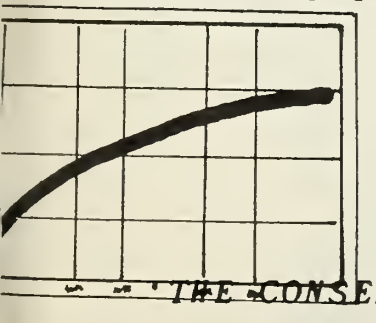
Soil moisture over these basins remains high and is better than last year. As stated in the February 1 bulletin, this area generally has good Fall precipitation and consequently good soil moisture going into the winter season. Therefore, currently the soil moisture is not much better than the average.

RESERVOIR STORAGE

Reservoir storage in this area is above last year and generally near normal.

Groundhog reservoir is 79% of normal while Vallecito reservoir is 170% of the 1943-57 average. Combined, these reservoirs are filled to 53% of capacity.

EXPECTED STREAMFLOW



Conditions at this time indicate that runoff in the Southwestern portion of Colorado and the area served by the San Juan in New Mexico will be good. Runoff during the April-September period will be considerably above the 1943-57 average. All of the streams are anticipated to flow in excess of 125% of normal.

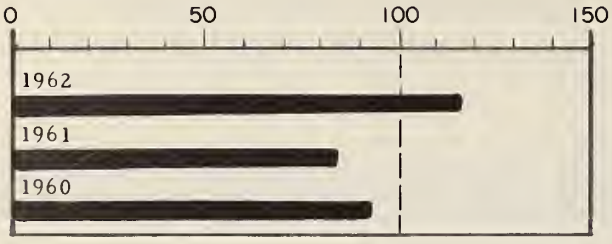
'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

ISSUED BY: SOIL CONSERVATION SERVICE

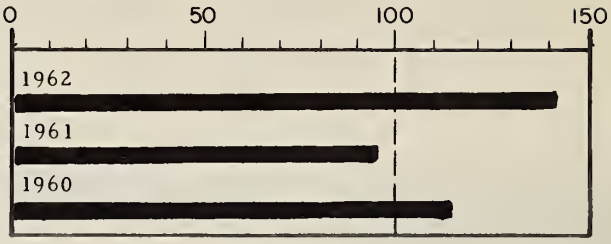
K. W. Chalmers, State Conservationist, Colorado
Benny Martin, Area Conservationist, Monte Vista, Colorado
E A. Nicholson, Area Conservationist, Grand Junction, Colorado
C. A. Tidwell, State Conservationist, New Mexico
J. B. Christy, Area Conservationist Albuquerque, N. M.

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

SAN JUAN

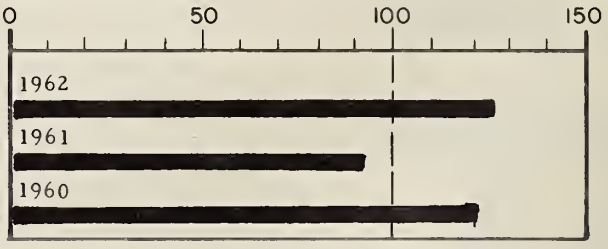


PIEDRA-PINOS-FLORIDA



DOLORES

ANIMAS-LA PLATA



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Groundhog	21.7	5.5	4.0	7.0
Vallecito	126.3	71.2	42.1	41.0

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER AVE.	DEP.
Dolores	8.17	+2.19	1.61	-1.37
San Juan	11.76	+4.04	2.94	- .57

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Cascade	7.0	5.1	4.5	5.4
Dolores	7.0	0.1	0.7	1.7
Lizard Head	7.0	5.7	4.1	5.3
Mineral Creek	7.0	4.9	4.1	4.8
Molas Lake	7.0	3.8	0.9	3.4
Rico	7.0	5.0	4.8	5.0

ALL PROFILES 4 FEET DEEP

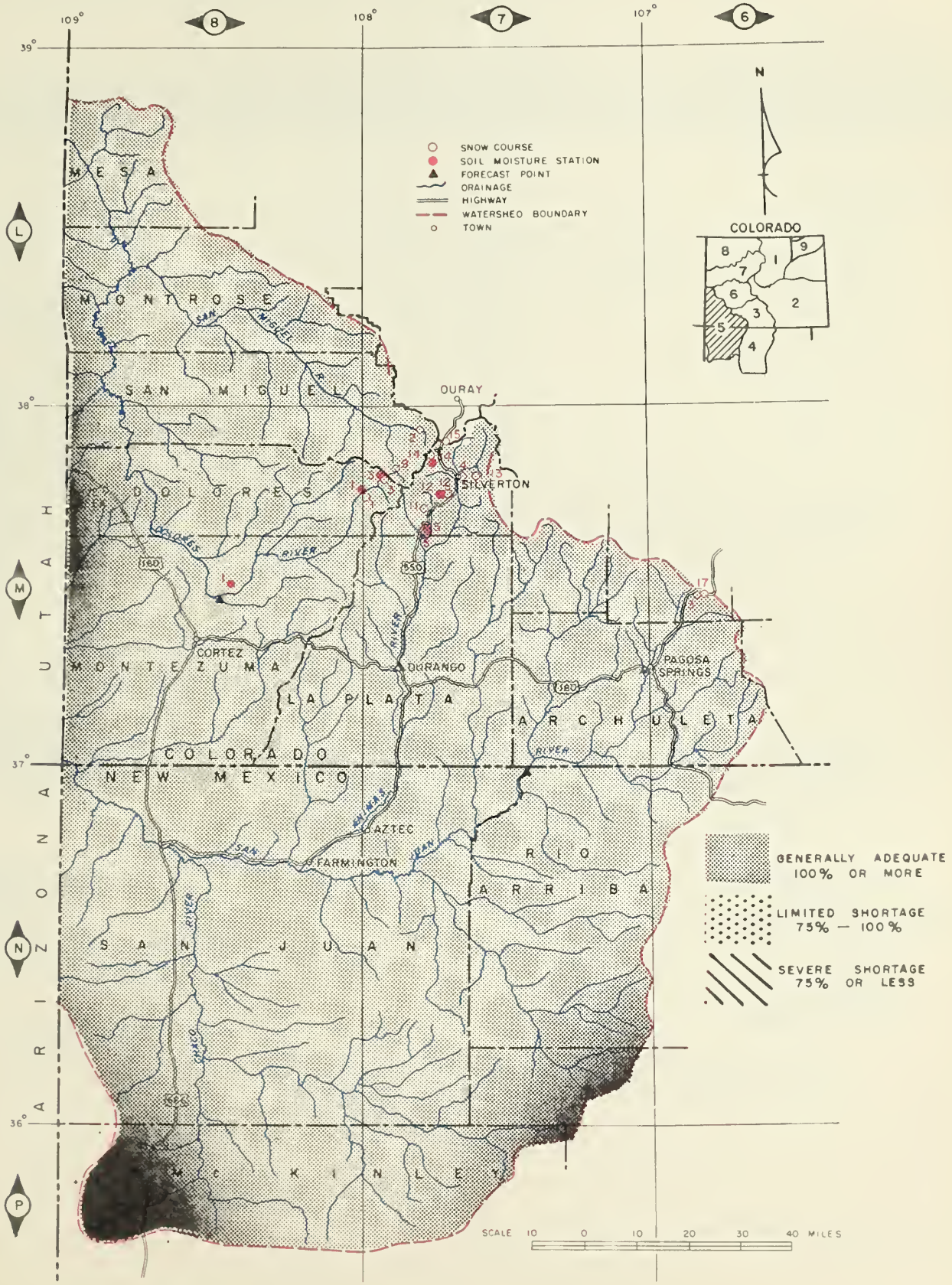
STREAMFLOW FORECAST (1,000 AC. FT.)

APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Animas at Durango	650	137	475
Dolores at Dolores	375	134	279
Florida near Durango	78	126	62
LaPlata at Hesperus	41	146	28
Los Pinos near Bayfield*	325	148	220
Piedra Creek near Piedra	270	145	186
San Juan at Rosa, N. M.	840	143	587

* OBSERVED FLOW PLUS CHANGES IN STORAGE IN VALLECITO RESERVOIR

SAN MIGUEL-DOLORES-ANIMAS-SAN JUAN RIVERS WATERSHEDS IN COLORADO & NEW MEXICO



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SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
SAN JUAN RIVER						
Chama Divide (B)	6N2	2/26	17	4.0	3.0	4.4
Chamita (B)	6N3	2/26	44	9.0	5.8	9.3
Upper San Juan	6M3	2/28	115	34.1	11.8	27.6
Wolf Creek Pass (B)	6M1	3/1	104	32.9	9.8	25.4
Wolf Creek Summit	6M17	2/28	112	32.4	11.3	24.7*
ANIMAS RIVER						
Cascade	7M5	2/28	55	14.5	5.5	11.3
Howardville	7M13	Est.	53	13.0	5.9	8.7*
Ironton Park (B)	7M6	2/27	47	12.6	8.8	10.3
Mineral Creek	7M14	2/28	63	17.3	6.0	11.8*
Molas Lake	7M12	2/28	60	16.3	5.1	12.5*
Red Mountain Pass	6M19	2/28	103	34.2	16.4	22.5*
Silverton Sub-Station	7M4	2/28	36	9.0	2.5	5.1
Spud Mountain	7M11	2/28	99	29.0	10.8	20.3*
DOLORES RIVER						
Lizard Head	7M3	2/26	68	18.9	8.0	13.2
Rico	7M1	2/26	37	9.5	6.0	7.9
Telluride	7M2	2/26	30	7.0	4.5	6.7
Trout Lake	7M9	2/26	61	14.8	6.4	11.5*

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft. Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

GUNNISON RIVER WATERSHED IN COLORADO

as of

March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

Snow pack on the Gunnison is about 134% of normal. Low snows are just above average but the higher elevation snow pack is considerably above normal. Snow cover over the Uncompahgre basin is 36% above normal.

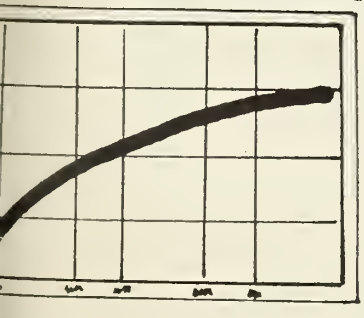
SOIL MOISTURE

Another bright spot on this drainage is the soil moisture. The mountain soils are almost saturated. This condition will increase streamflow over the entire basin.

RESERVOIR STORAGE

Storage in Taylor Park Reservoir is nearly twice last year and 74% of capacity. This reservoir has not been this full since 1958. This will be a good supplemental water supply.

EXPECTED STREAMFLOW



Streamflow over the basin should be more than adequate. All streams are being forecast above normal.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

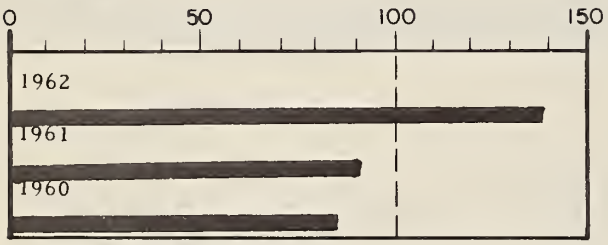
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist, Colorado

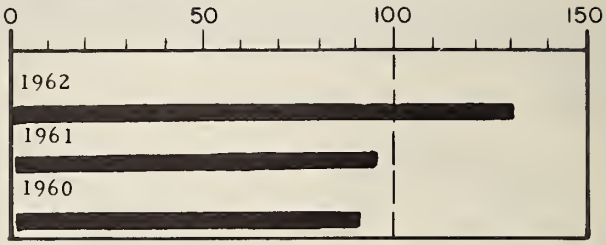
E. A. Nicholson, Area Conservationist, Grand Junction, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

GUNNISON



UNCOMPAHGRE



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Taylor	106.2	78.4	46.2	60.9

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER Dec-Jan AVE.	DEP.
Gunnison	8.28	+3.83	3.09	+.92

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
King	8.0	5.5	2.6	5.4
Maroon	8.0	7.0	0.1	2.6
Mineral Creek	7.0	4.9	4.1	4.8
Placita	8.0	6.4	0.1	2.1

ALL PROFILES 4 FEET DEEP

STREAMFLOW FORECAST (1,000 AC. FT.)

APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Gunnison nr. Grand Jct.	1900	137	1386
Surface Cr. at Cedaredge	25	139	18
Uncompahgre at Colona	198	137	145

GUNNISON RIVER WATERSHED IN COLORADO

USDA SCS LINCOLN NEBR '86

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SNOW

SNOW COURSE	NO.	CURRENT INFORMATION			PAST RECORD	
		DATE OF SURVEY	SNOW DEPTH (INCHES)	WATER CONTENT (INCHES)	WATER CONTENT (INCHES) LAST YEAR	WATER CONTENT (INCHES) AVERAGE 1943 - 57
GUNNISON RIVER						
Alexander Lake (A)	7K3	2/28	89	24.0	7.2	17.6
Black Mesa	7L5	2/27	64	17.8	--	--
Blue Mesa	7L2	2/27	42	10.3	4.0	--
Cochetopa Pass (B)	6L6	2/26	26	5.6	5.3	4.8*
Crested Butte	6L1	2/25	61	14.9	6.4	12.6
Keystone	7L3	2/28	88	26.3	7.6	--
Lake City	7M8	2/24	38	9.7	5.5	7.8*
Long Draw	7L4	2/27	43	10.6	4.5	--
Mesa Lakes (B)	7K4	2/25	60	15.3	7.1	13.2
Monarch Pass (B)	6L4	2/26	73	21.6	12.6	14.9
McClure Pass (A)	7K8	2/28	79	23.7	8.6	13.5*
Mineral Creek (B)	7M14	2/28	63	17.3	6.0	11.8*
North Lost Trail (A) (B)	7K1	2/28	71	22.0	7.1	12.8
Park Cone	6L2	3/1	57	13.5	4.4	9.4
Park Reservoir (A)	7K6	2/28	105	30.5	9.9	20.9
Porphyry Creek	6L3	2/26	68	19.8	11.8	13.5
Trickle Divide (B) (A)	7K5	2/28	109	31.6	12.2	22.2
Tomichi	6L7	2/26	51	13.6	7.2	--
UNCOMPAHGRE RIVER						
Ironton Park	7M6	2/27	47	12.6	8.8	10.3
Lizard Head	7M3	2/26	68	18.9	8.0	13.2
Red Mountain Pass (B)	7M15	2/28	103	34.2	16.4	22.5*
Telluride	7M2	2/26	30	7.0	4.5	6.7
Trout Lake	7M9	2/26	61	14.8	6.4	11.5*

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
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Colorado State University
Ft Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

COLORADO RIVER WATERSHED IN COLORADO

as of
March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

As of March 1, snow cover on this basin remains well above normal. The high elevations are 50% higher than usual while the lower areas are only about 10 to 20 percent above normal. The basin as a whole is 135% of normal.

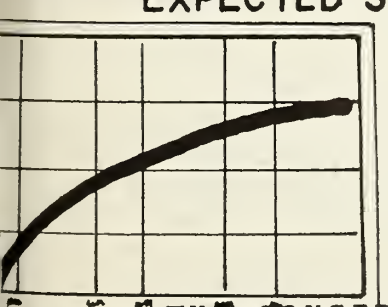
SOIL MOISTURE

Soil moisture remains relatively good. As indicated in the February bulletin this will increase the runoff this summer.

RESERVOIR STORAGE

Considering only two reservoirs on the Colorado drainage, Granby and Green Mountain, storage is exceptionally high. Granby, which is a part of the Big Thompson Project is higher than any time since 1953-54 season.

EXPECTED STREAMFLOW



Streamflow will be above average over the entire basin. The Roaring Fork will flow about 140% of average while the other tributaries will be slightly less. The Colorado as a whole should flow in the vicinity of 130% of the 1943-57 average.

THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist,
Colorado

E. A. Nicholson, Area Conservationist
Grand Junction, Colorado
M. H. Weaver, Area Conservationist,
Glenwood Springs, Colorado

SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
COLORADO RIVER (UPPER)						
Arrow	5K6	2/26	52	12.4	5.6	9.0
Berthoud Pass	5K3	2/27	60	16.4	7.9	11.5
Berthoud Summit	5K14	2/27	67	19.6	10.7	14.2*
Blue River	6K21	2/27	36	8.7	3.7	--
Cooper Hill	6K23	2/25	54	11.9	6.4	--
Fiddlers Gulch	6K5	Est.	75	20.6	NS	13.6
Fremont Pass	6K8	2/27	68	18.2	7.4	13.2
Frisco	6K13	2/28	35	8.6	2.7	7.8*
Glen Mar Ranch	6K20	2/23	42	8.9	4.6	7.2*
Gore Pass	6J11	2/27	54	14.3	3.9	9.2*
Granby	5J16	2/26	38	8.6	2.8	5.9*
Grand Lake	5J19	2/26	44	10.1	4.8	7.4*
Grizzly Peak	5K9	2/26	67	19.1	7.3	14.9
Hoosier Pass (B)	6K1	2/27	49	13.5	7.0	10.0
Jones Pass	5K21	2/23	57	14.8	6.8	--
Lake Irene	5J10	Est.	80	26.0	8.6	18.6
Lapland	5K7	2/27	50	12.7	4.2	10.3
Lulu	5J7	Est.	67	18.4	8.8	13.9
Lynx Pass	6K6	2/27	65	16.3	5.5	10.6
McKenzie Gulch	6K28	2/26	27	6.6	--	--
Middle Fork Camp Ground	5K4	2/23	41	10.1	5.4	8.0
Milner Pass	5J24	NS	--	--	NS	11.2*
Monarch Lake	5J14	2/27	44	10.9	5.8	10.8*
North Inlet Grand Lake	5J9	Est.	44	10.8	NS	8.0
Pando	6K19	2/27	39	10.2	4.4	9.9*
Phantom Valley	5J4	2/26	46	11.4	4.5	8.9
Ranch Creek	5K18	2/26	43	10.9	4.6	--
Shrine Pass	6K9	2/27	71	20.5	7.7	14.0
Snake River	5K16	2/26	38	8.8	3.0	7.9*
Summit Ranch	6K14	Est.	45	10.2	5.6	6.9*
Tennessee Pass	6K2	2/26	54	11.7	4.8	7.9
Vail Pass	6K15	2/27	75	21.0	6.6	16.5*
Vasquez Creek	5K19	2/26	53	14.6	5.5	--
Willow Creek Pass	6J5	2/26	69	15.5	6.3	10.8
ROARING FORK RIVER						
Aspen	7J22	2/23	63	16.4	6.8	--
Independence Pass Tunnel	6K4	2/26	76	24.4	6.8	14.3
Ivanhoe	6K10	2/26	73	20.1	5.9	15.7*
Lift	7K27	2/23	82	21.0	10.9	--
McClure Pass (A)	7K8	2/28	79	23.7	8.6	13.5*
Nast	6K6	2/24	35	6.9	2.0	6.0
North Lost Trail (A)	7K1	2/28	71	22.0	7.1	8.0
PLATEAU CREEK						
Alexander (A) (B)	7K3	2/28	89	24.0	7.2	17.6
Mesa Lakes	7K4	2/25	60	15.3	7.1	13.2
Park Reservoir (A) (B)	7K6	2/28	105	30.5	9.9	20.9
Trickle Divide (A)	7K5	2/28	109	31.6	12.2	22.2

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
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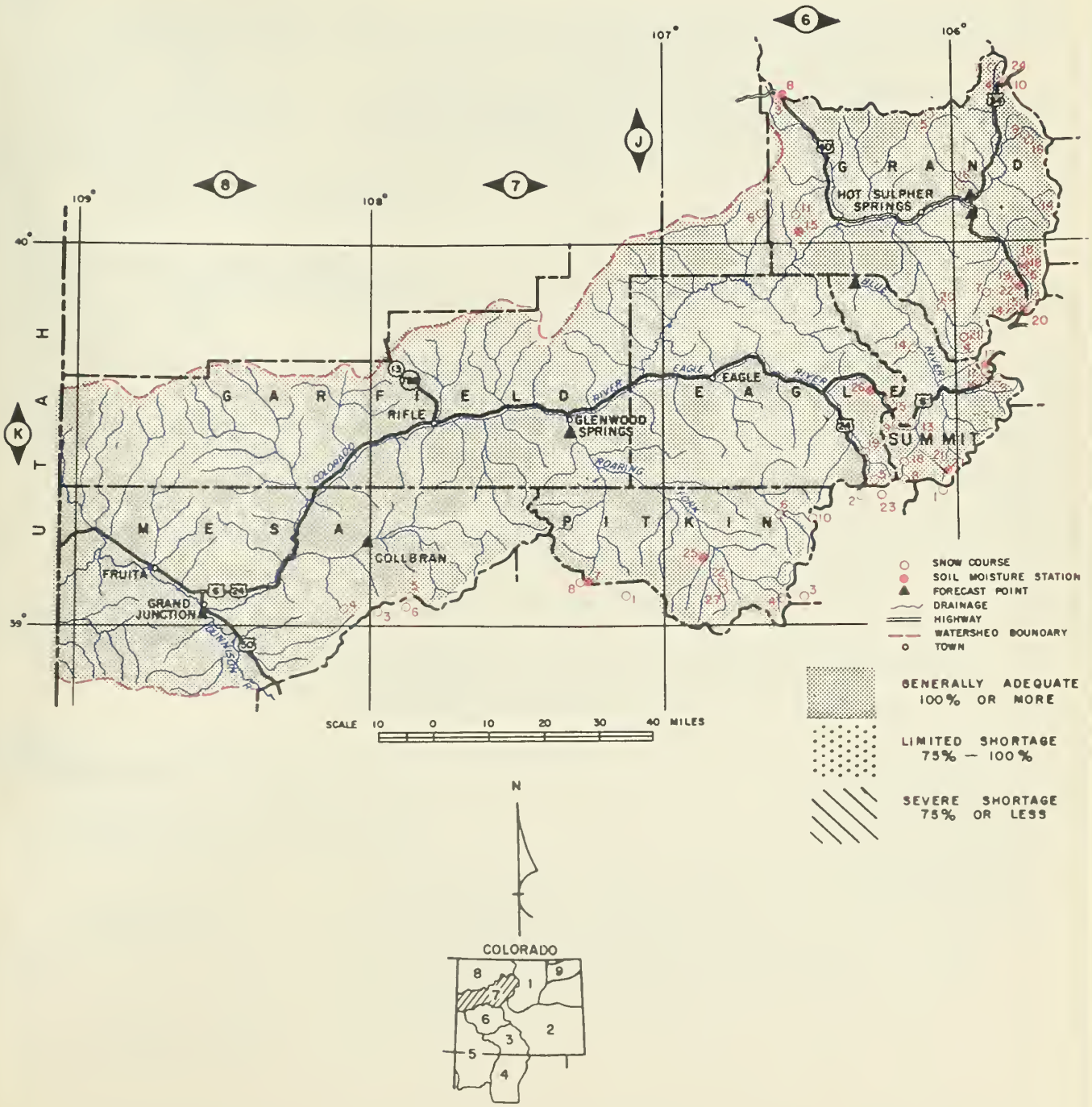
Colorado State University
Ft. Collins, Colorado

COLORADO RIVER WATERSHED IN COLORADO



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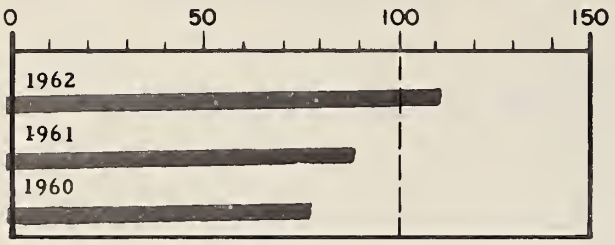
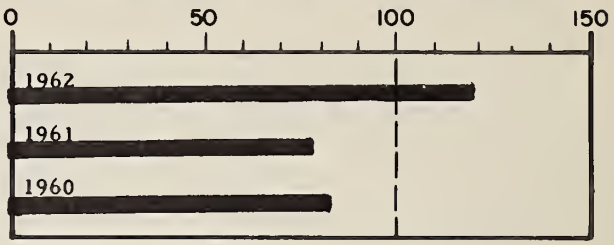
WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

UPPER COLORADO ABOVE GLENWOOD SPRINGS



LOWER COLORADO BELOW GLENWOOD SPRINGS



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Granby*	465.5	354.5	247.5	201.3
Green Mt.	146.9	82.9	65.0	68.0

MEASURED FIRST OF MONTH

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	DEP.	WINTER Dec-Jan AVE.	DEP.
Upper Colorado	9.86	+4.59	3.35	+.57
Lower Colorado	8.26	+3.61	2.03	+.12

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Berthoud Pass	8.0	6.7	5.4	4.0
Blue River	7.0	5.6	1.3	3.1
Gore	7.0	4.8	0.2	1.6
Maroon	8.0	7.0	0.1	2.6
Muddy Pass	8.0	7.4	0.6	2.7
Placita	8.0	6.4	0.1	2.1
Ranch Creek	7.0	5.5	3.9	4.4
Vail Pass	8.0	7.0	0.2	2.8
Vasquez	7.0	--	5.4	3.9

ALL PROFILES 4 FEET DEEP

STREAMFLOW FORECAST (1,000 AC. FT.

APRIL THROUGH SEPTEMBER.

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Blue River abv. Green Mt. Dam	325	121	290
Colo. R. nr. Granby (4)	285	121	235
Colo. R. at Glenwood Sprs.(5)	2000	129	1546
Plateau Cr. near Collbran	69	121	57
Roaring Fork at Glenwood Springs (6)	1100	136	803
Williams Fork nr. Parshall	110	140	78
Willow near Granby	65	148	44

(4) Observed flow plus diversions by Adams tunnel and Grand River ditch plus change in storage in Granby Reservoir.

(5) Observed flow plus the changes as indicated in (4) plus Moffat Ditch.

(6) Observed flow plus diversion through Twin Lakes tunnel.

RETURN IF NOT DELIVERED
UNITED STATES
DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE
Snow Survey
Colorado State University
Ft. Collins, Colorado
OFFICIAL BUSINESS

POSTAGE AND FEES PAID
U.S. DEPARTMENT OF AGRICULTURE

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

YAMPA, WHITE, & NORTH PLATTE RIVERS WATERSHEDS IN COLORADO

as of
March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

Snow pack in these three basins improved slightly during the month of February. Several heavy snows contributed to the pack already laid down and left water prospects good for this summer. Considerable difficulty was experienced in getting snow course measurements, due to recent heavy snowfall.

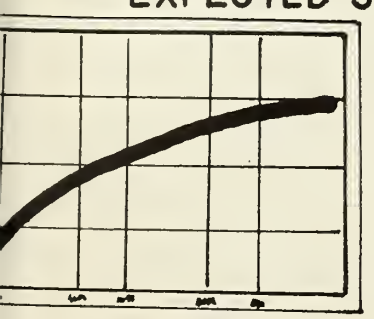
SOIL MOISTURE

Soil moisture continues to be the best on record. This should contribute substantially to the runoff this summer.

RESERVOIR STORAGE

There are no major reservoirs on these drainages in Colorado, however, reservoirs in Wyoming and Nebraska are below normal.

EXPECTED STREAMFLOW



Streamflow will be more than adequate for irrigation requirements in Colorado. All of the rivers in these basins will flow above normal. It is expected that the Little Snake will flow as much as 150% of normal. The North Platte should far exceed last year's flow.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

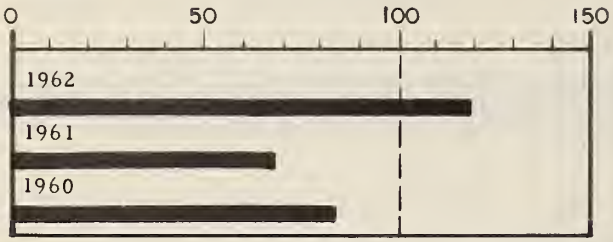
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist, Colorado

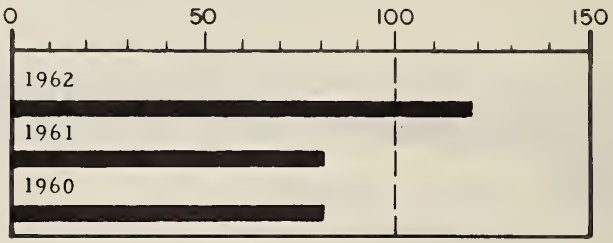
M. H. Weaver, Area Conservationist, Glenwood Springs, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

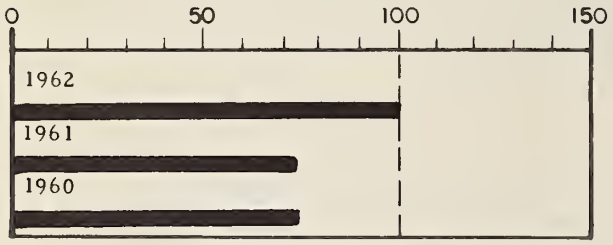
YAMPA



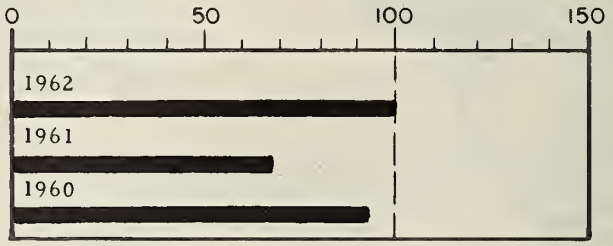
WHITE



LARAMIE



NORTH PLATTE



SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Hahn's Peak	8.0	8.0	5.9	--
Laramie Road	7.0	6.0	0.8	2.6
Muddy Pass	8.0	7.4	0.6	2.7
Two Mile	8.0	5.8	0.5	2.6
Willow Pass	7.0	7.0	1.1	3.9

ALL PROFILES 4 FEET DEEP

STREAMFLOW FORECAST (1,000 AC. FT.)

APRIL THROUGH SEPTEMBER

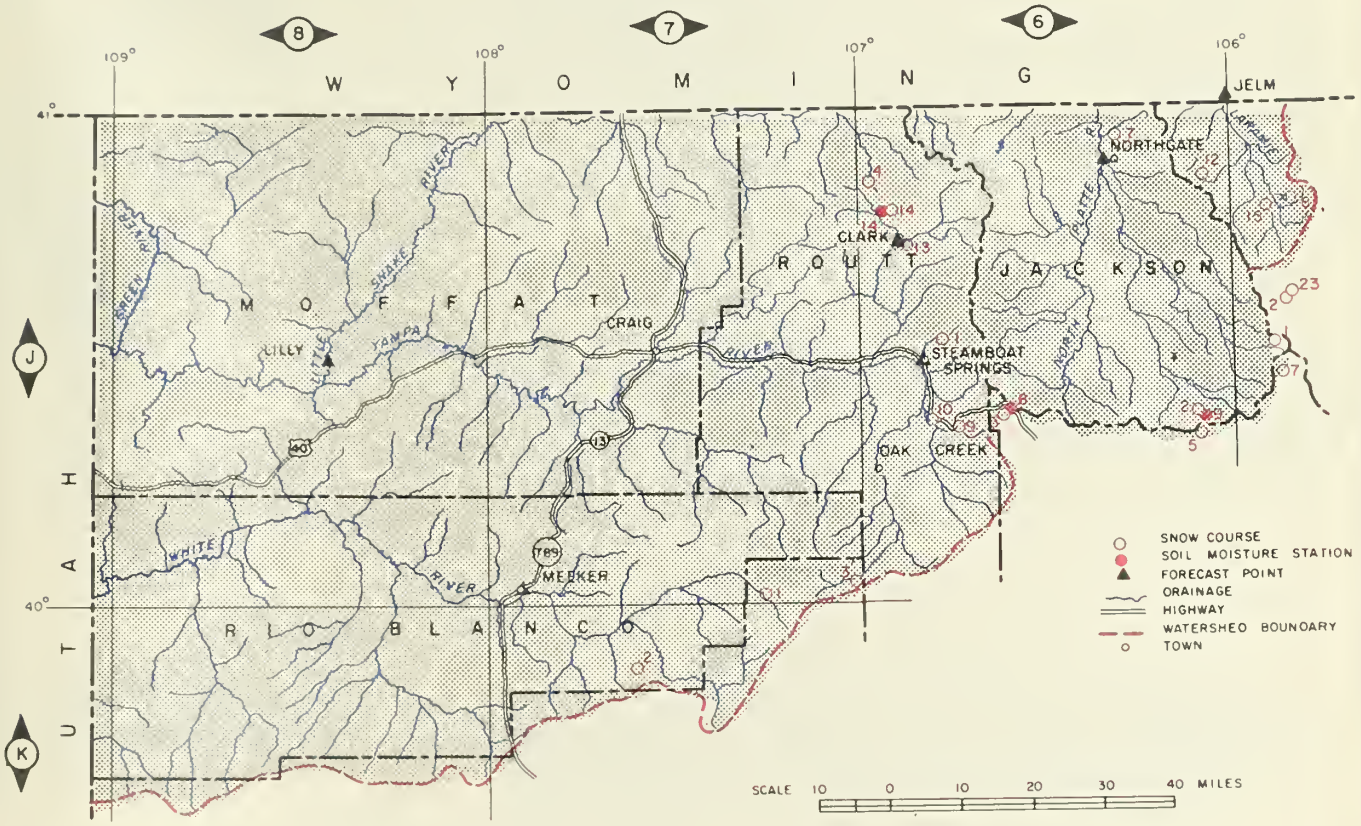
STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Elk at Clark	274	127	215
Laramie at Jelm	146	130	113
Little Shake at Lilly	500	142	350
North Platte at Northgate	420	165	255
White at Meeker	420	125	335
Yampa at Steamboat Sprgs.	350	124	283

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	AUGUST THROUGH NOVEMBER DEP.	WINTER Dec-Jan AVE.	WINTER Dec-Jan DEP.
North Platte	6.08	+3.07	.93	+.13
White	8.33	+3.81	2.08	+.06
Yampa	9.93	+4.14	3.80	+.19

PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

YAMPA, WHITE, & NORTH PLATTE RIVERS WATERSHEDS IN COLORADO



GENERALLY ADEQUATE
100% OR MORE

LIMITED SHORTAGE
75% — 100%

SEVERE SHORTAGE
75% OR LESS

5,L-17,265

SNOW

SNOW COURSE	NO.	CURRENT INFORMATION			PAST RECORD	
		DATE OF SURVEY	SNOW DEPTH (INCHES)	WATER CONTENT (INCHES)	WATER CONTENT (INCHES) LAST YEAR	WATER CONTENT (INCHES) AVERAGE 1943 - 57
NORTH PLATTE RIVER						
Cameron Pass (A)	5J1	Delayed			14.8	18.0
Columbine Lodge	6J3	2/26	92	26.4	12.2	19.6
Deadman Hill (A) (B)	5J6	Delayed			NS	12.2
McIntyre (B)	5J15	NS	--	--	NS	9.3*
Northgate	6J7	2/26	40	9.1	3.3	5.3*
Park View	6J2	2/26	54	11.7	4.6	7.7
Roach (A) (B)	6J12	Delayed			9.0	15.7
Willow Creek Pass (B)	6J5	2/26	69	15.5	6.3	10.8
YAMPA RIVER						
Bear River	7J3	NS	--	--	NS	--
Clark (A)	6J13	3/1	63	18.3	6.2	--
Columbine Lodge (B)	6J3	2/26	92	26.4	12.2	19.6
Dry Lake (A)	6J1	3/1	88	26.4	11.3	17.1
Elk River (A)	6J4	3/1	76	22.0	9.6	15.1
Hahn's Peak	6J14	NS	--	--	6.2	--
Lynx Pass (B)	6J6	2/27	65	16.3	5.5	10.6
Rabbit Ears	6J9	2/26	105	28.3	14.5	22.0*
Yampa View	6J10	2/26	63	17.0	8.3	12.8*
WHITE RIVER						
Burro Mountain (A)	7K2	2/28	81	22.7	10.9	14.6
Rio Blanco	7J1	3/4	56	15.8	7.8	13.1

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft Collins, Colorado

WATER SUPPLY OUTLOOK
FOR THE SOIL CONSERVATION DISTRICTS IN THE

LOWER SOUTH PLATTE RIVER WATERSHED IN COLORADO

as of
March 1, 1962

U. S. DEPARTMENT OF AGRICULTURE - SOIL CONSERVATION SERVICE
COLORADO EXPERIMENT STATION - STATE ENGINEERS OF COLORADO AND NEW MEXICO

SNOW COVER

The snow pack over the upper basins of the South Platte and its tributaries is 128% of the 15-year average. A few of the low elevation snow courses lost some of their snow pack during the month of February. This is most unusual and was probably caused by the week of unseasonably high temperatures. The snow pack that exists is adequate to guarantee good water supplies this summer.

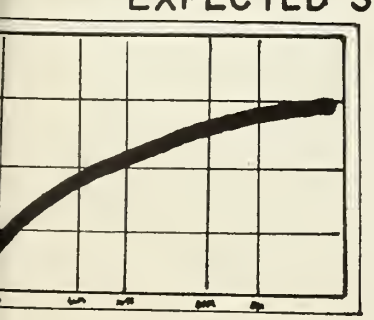
SOIL MOISTURE

Soil moisture, as indicated in the February bulletin, is near a record high. This condition will increase the flow expected from the melting snow. The valley are all reporting fair soil moisture.

RESERVOIR STORAGE

Carry-over storage in the reservoirs on the lower South Platte is slightly above average. Upstream reservoirs are in better shape. They average about 140% of the 15-year average. A good supplemental supply of reservoir water is in prospect for this year.

EXPECTED STREAMFLOW



All tributaries and the main stem of the South Platte will flow better than average this year. Good water supplies both on the upper and lower Platte are assured. Above average streamflow, above average soil moisture, and above average carry-over storage are bright prospects for water supplies this coming season. Streamflow has been above normal all winter.

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

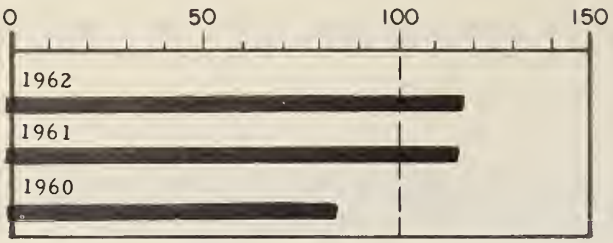
ISSUED BY: SOIL CONSERVATION SERVICE

K. W. Chalmers, State Conservationist
Colorado

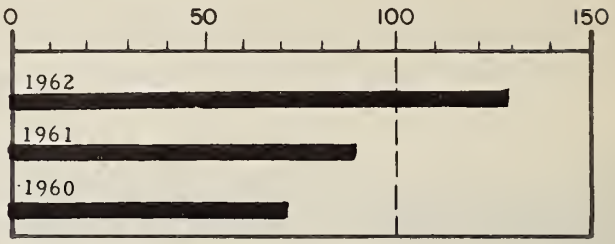
Wallace L. Bruce, Area Conservationist
Sterling, Colorado

WATER SUPPLY OUTLOOK IN PERCENT OF 1943-57 AVERAGE

UPPER SOUTH PLATTE



LOWER SOUTH PLATTE



RESERVOIR STORAGE (1,000 AC. FT.)

RESERVOIR	USABLE CAPACITY	THIS YEAR	LAST YEAR	15 YEAR AVERAGE 1943 - 57
Carter *	108.9	93.1	74.1	63.7
Cheeseman	79.0	78.5	59.7	47.6
Eleven Mile	81.9	97.8	97.8	69.3
Empire	37.7	29.6	31.7	26.6
Horsetooth*	143.5	128.2	98.8	88.0
Jackson Lake	35.4	29.8	32.2	30.6
Julesburg	28.2	19.1	19.1	20.5
Point of Rocks	70.0	65.9	57.1	51.2
Prewitt	32.8	23.0	5.4	18.6
Riverside	57.5	50.4	53.2	42.6

* Shorter Period

Carter and Horsetooth Reservoirs are part of the Big Thompson Project.

* Shorter Period.

MEASURED FIRST OF MONTH

SOIL MOISTURE

STATION	CAPACITY (INCHES)	THIS YEAR	LAST YEAR	AVERAGE (ALL PAST DATA)
Alpine Camp	7.0	4.2	0.5	1.7
Beaver Dam	6.0	3.3	0.7	1.5
Feather	6.0	2.9	0.0	1.3
Guard Station	7.0	4.6	0.7	1.4
Hoop Creek	6.0	5.4	0.5	2.4
Hoosier Pass	7.0	6.9	0.9	2.9
Kenosha Pass	7.0	4.2	0.4	--
Laramie Road	7.0	6.0	0.8	2.6
Two Mile	8.0	5.8	0.5	3.3

ALL PROFILES 4 FEET DEEP

PRECIPITATION

STATION	AUGUST THROUGH NOVEMBER AVE.	AUGUST THROUGH NOVEMBER DEP.	WINTER Dec-Jan AVE.	WINTER Dec-Jan DEP.
Upper So.Pl.	8.07	+3.71	1.42	+.39
Lower So.Pl	7.15	+2.52	.66	-.04

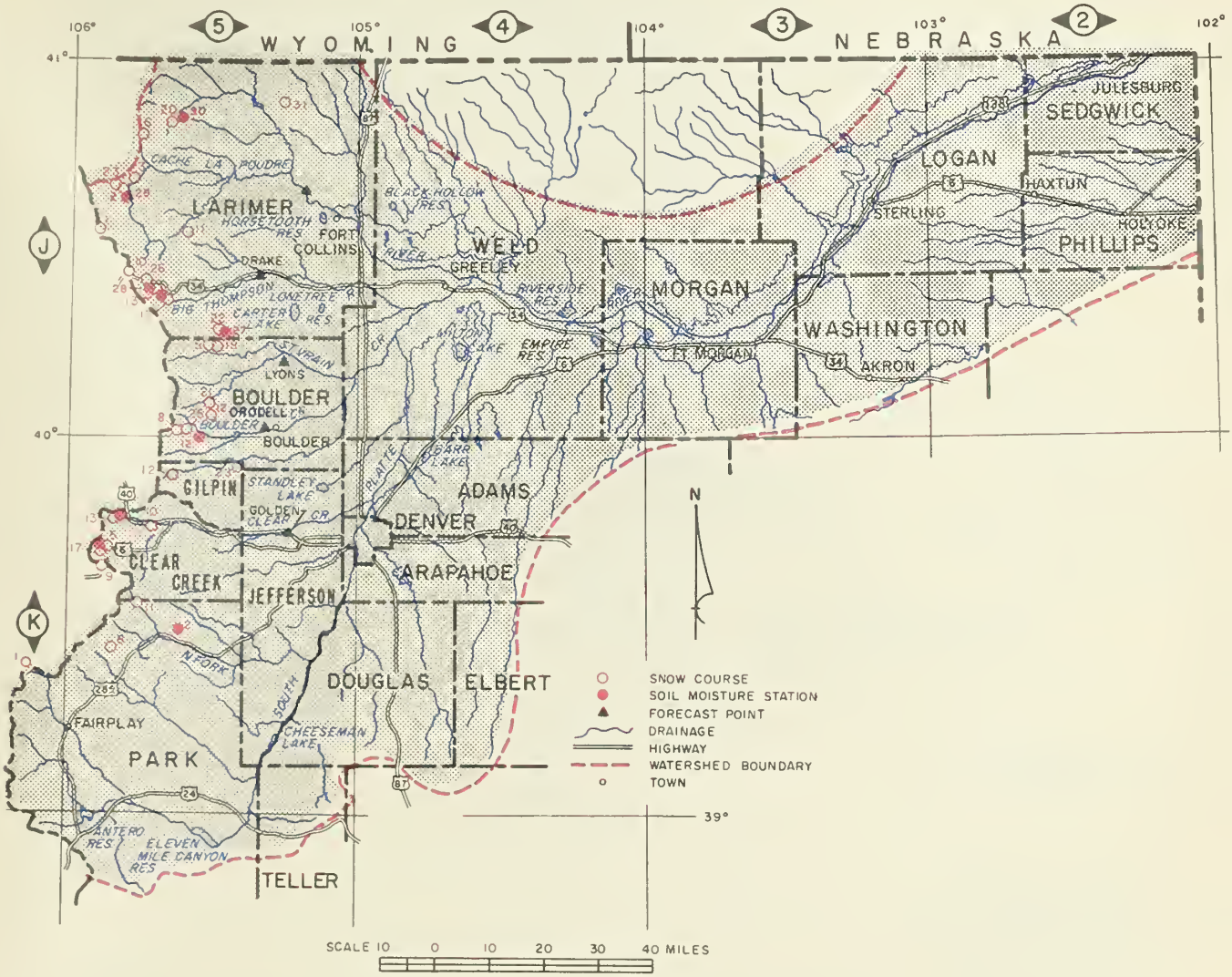
PRELIMINARY U.S. WEATHER BUREAU DATA
AVERAGE OF SELECTED STATIONS

STREAMFLOW FORECAST (1,000 AC. FT.

APRIL THROUGH SEPTEMBER

STREAM AND STATION	FORECAST APRIL - SEPT.	THIS YEAR % AVERAGE	AVERAGE 1943-57
Cache La Poudre at Canon(1)	225	120	189
Big Thompson at Drake (2)	134	126	106
Saint Vrain at Lyons	115	137	84
Boulder at Orodell	70	127	55
Clear Creek at Golden (3)	190	139	137

LOWER SOUTH PLATTE RIVER WATERSHED IN COLORADO



GENERALLY ADEQUATE
100% OR MORE

LIMITED SHORTAGE
75% — 100%

SEVERE SHORTAGE
75% OR LESS

USDA-SCS-LINCOLN NEBR (361)

5,L-18,031

SNOW

SNOW COURSE	NO.	CURRENT INFORMATION: DATE OF SURVEY	CURRENT INFORMATION: SNOW DEPTH (INCHES)	CURRENT INFORMATION: WATER CONTENT (INCHES)	PAST RECORD: WATER CONTENT (INCHES): LAST YEAR	PAST RECORD: WATER CONTENT (INCHES): AVERAGE 1943 - 57
SOUTH PLATTE RIVER AND TRIBUTARIES						
Baltimore	5K23	2/27	33	9.4	5.8	--
Berthoud Falls	5K13	2/27	55	15.9	9.2	11.8*
Big South	5J3	3/4	11	2.5	0.9	2.2
Boulder Falls	5J25	2/26	46	6.6	6.4	10.3*
Cameron Pass (A)	5J1	Delayed			14.8	18.0
Chambers Lake	5J2	3/4	38	10.3	4.1	7.0
Copeland Lake	5J18	2/27	16	2.7	3.3	4.9*
Deadman Hill (A)	5J6	Delayed			8.1	12.2
Deer Ridge	5J17	2/26	35	8.0	2.0	4.9*
Empire	5K10	2/27	36	10.0	4.7	5.0*
Geneva Park	5K11	2/28	20	4.3	1.4	3.8*
Grizzly Peak (B)	5K9	2/26	67	19.1	7.3	14.9
Hidden Valley	5J13	2/25	53	13.0	6.1	9.4
Hoosier Pass	6K1	2/27	49	13.5	7.0	10.0
Hour Glass Lake	5J11	3/2	29	7.1	3.3	6.6
Jefferson Creek	5K8	2/26	43	11.0	4.3	7.5
Lake Irene (B)	5J10	Est.	80	26.0	8.6	18.6
Long's Peak	5J22	2/24	38	9.4	5.6	10.1*
Lost Lake	5J23	3/4	51	15.1	5.8	10.4*
Loveland Pass	5K5	2/28	54	16.3	8.1	12.5
Loveland Lift No. 1	5K24	2/26	91	27.1	12.7	--
Pine Creek	5J31	2/27	12	1.8	2.2	--
Red Feather	5J20	2/27	32	6.8	5.3	6.9
Two Mile	5J26	2/25	69	19.0	6.1	11.9*
University Camp	5J8	2/26	62	20.6	10.8	17.7
Ward	5J21	2/26	24	5.9	4.8	5.6*
Wild Basin	5J5	Est.	65	18.4	5.8	11.9

NOTE: * - 1943 - 57 (ADJUSTED AVERAGES)
NS - NO SURVEY
(A) - AIR OBSERVED
(B) - ON ADJACENT DRAINAGE

This Report Prepared by
Jack N. Washichek and Don W. McAndrew
Soil Conservation Service
Colorado State University
Ft Collins, Colorado

Federal-State Cooperative
Snow Surveys and Water Supply Forecasts
for

Colorado, Rio Grande, Platte and Arkansas Drainage Basins

LIST AND LOCATION of SNOW COURSES and SOIL MOISTURE STATIONS

SEASON 1962

SOIL CONSERVATION SERVICE
Colorado Agricultural Experiment Station
Fort Collins, Colorado

'THE CONSERVATION OF WATER BEGINS WITH THE SNOW SURVEY'

UNITED STATES DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE

Federal-State Cooperative Snow Surveys
and Water Supply Forecasts
Fort Collins, Colorado
1962 Season

LIST AND LOCATION OF SNOW COURSES AND SOIL MOISTURE STATIONS

The following is a listing of snow courses and soil moisture stations for Colorado and New Mexico which are shown on maps on the interior pages.

No.	State	Name	Sec.	Twp.	Rge.	Elev.
		North Platte				
6J2	C	Park View	24	5N	78W	9200
6J3	C	Columbine	21	5N	82W	9300
6J7	C	Northgate	8	11N	79W	8500
		Laramie				
6J12	C	Roach	5	10N	77W	9800
5J15	C	McIntyre	35	10N	76W	9100
		South Platte				
5J1	C	Cameron Pass	2	6N	76W	10300
5J2	C	Chambers Lake	6	7N	75W	9000
5J3	C	Big South	33	8N	75W	8600
6K1	C	Hoosier Pass	13	8S	78W	11400
5J5	C	Wild Basin	24	3N	74W	10000
5J6	C	Deadman Hill	29	10N	75W	10200
5J8	C	University Camp	28	1N	73W	10300
5K5	C	Loveland Pass	27	4S	76W	10600
5J11	C	Hour Glass Lake	18	7N	73W	9500
5K8	C	Jefferson Creek	14	7S	76W	10100
5J13	C	Hidden Valley	23	5N	74W	9550
5J17	C	Deer Ridge	19	5N	73W	9050
5J18	C	Copeland Lake	21	3N	73W	8600
5K10	C	Empire	21	3S	75W	9700
5K11	C	Geneva Park	18	6S	74W	9750
5J20	C	Red Feather	26	10N	74W	9000
5K12	C	Moffatt	2	2S	74W	9400
5J21	C	Ward	1	1N	73W	9500
5K13	C	Berthoud Falls	16	3S	75W	10500
5J22	C	Longs Peak	32	4N	73W	10500
5J23	C	Lost Lake	32	8N	75W	9300
5K17	C	Clear Creek	33	4S	76W	11200
5J25	C	Boulder Falls	26	1N	73W	10000
5J26	C	Two Mile	22	5N	74W	10500
5J31	C	Pine Creek	2	9N	73W	7900
5K23	C	Baltimore	4	2S	73W	8800
		Arkansas				
6K2	C	Tennessee Pass	21	8S	80W	10200
6K3	C	Twin Lakes Tunnel	22	11S	82W	10100
6K7	C	Four Mile Park	23	11S	81W	9700
6L4	C	Monarch Pass	16	49N	6E	10500
6L5	C	Saint Elmo	31	15S	80W	10600
6K11	C	Timberline	8	9S	81W	11100
6K17	C	East Fork	15	8S	79W	10700
5L2	C	Westcliffe	19	22S	73W	9000
5M5	C	Bourbon	Lat.37°15'		105°10'	9500
5M6	C	Blue Lakes	16	31S	69W	9300
5M7	C	Cuchapas Pass	24	31S	69W	10000
6L8	C	Garfield	33	50N	6E	9900
6K23	C	Cooper Hill	13	8S	80W	10800
		Plateau Creek				
7K4	C	Mesa Lakes	35	11S	96W	10000
7K5	C	Trickle Divide	23	11S	94W	10000

No.	State	Name	Sec.	Twp.	Rge.	Elev.
		Upper Colorado				
5J4	C	Phantom Valley	7	5N	75W	9300
5K3	C	Berthoud Pass	35	2S	75W	9700
5K4	C	M. F. Camp Ground	16	3S	77W	9000
6K5	C	Fiddler Gulch	1	8S	80W	11000
5J7	C	Lulu	25	6N	76W	10200
6J5	C	Willow Creek Pass	1	4N	78W	9500
5J9	C	N. Inlet Grand Lake	26	4N	75W	9000
5J10	C	Lake Irene	8	5N	75W	10600
5K6	C	Arrow	34	1S	75W	9900
5K7	C	Lapland	16	2S	76W	9300
6K8	C	Fremont Pass	2	8S	79W	11400
6J6	C	Lynx Pass	2	1N	83W	9100
6K9	C	Shrine Pass	15	6S	79W	10500
5K9	C	Grizzly Peak	2	5S	76W	11250
6K20	C	Glen-Mar Ranch	31	2S	77W	8850
5J14	C	Monarch Lake	30	2N	74W	8500
5J16	C	Granby	11	2N	77W	8700
5J19	C	Grand Lake	36	4N	75W	8600
5K14	C	Berthoud Summit	10	3S	75W	11300
5K15	C	Frazer View	34	2S	75W	10600
6J11	C	Gore Pass	2	1N	82W	8900
6K13	C	Frisco	18	6S	78W	9300
5K16	C	Snake River	9	5S	76W	9700
6K14	C	Summit Ranch	8	4S	78W	10000
5J24	C	Milner Pass	7	5N	75W	10100
6K15	C	Vail Pass	28	5S	79W	10000
6K18	C	Kokomo	23	7S	79W	10600
6K19	C	Pando	10	7S	80W	9500
5K21	C	Jones Pass	21	3S	76W	10400
5K18	C	Ranch Creek	22	1S	75W	9400
5K19	C	Vasquez	9	2S	75W	9600
6K21	C	Blue River	30	7S	77W	10500
		Roaring Fork				
6K4	C	Ind. Pass Tunnel	24	11S	83W	10200
7K1	C	North Lost Trail	20	11S	87W	9200
6K6	C	Nast	1	9S	83W	8700
6K10	C	Ivanhoe	12	9S	82W	10400
7K10	C	Lift	7	11S	84W	11250
6K22	C	Aspen	7	11S	84W	9700
		Yampa River				
6J1	C	Dry Lake	26	7N	84W	8200
6J4	C	Elk River	6	10N	85W	8700
6J9	C	Rabbit Ears	30	5N	83W	9550
6J10	C	Yampa View	21	5N	84W	8500
6J13	C	Clark	24	9N	85W	7800
7J3	C	Bear River	14	1N	86W	9100
6J14	C	Hahn's Peak	27	10N	85W	8500
		White River				
7K2	C	Burro Mountain	15	2S	91W	9000
7J1	C	Rio Blanco	28	1N	88W	8500

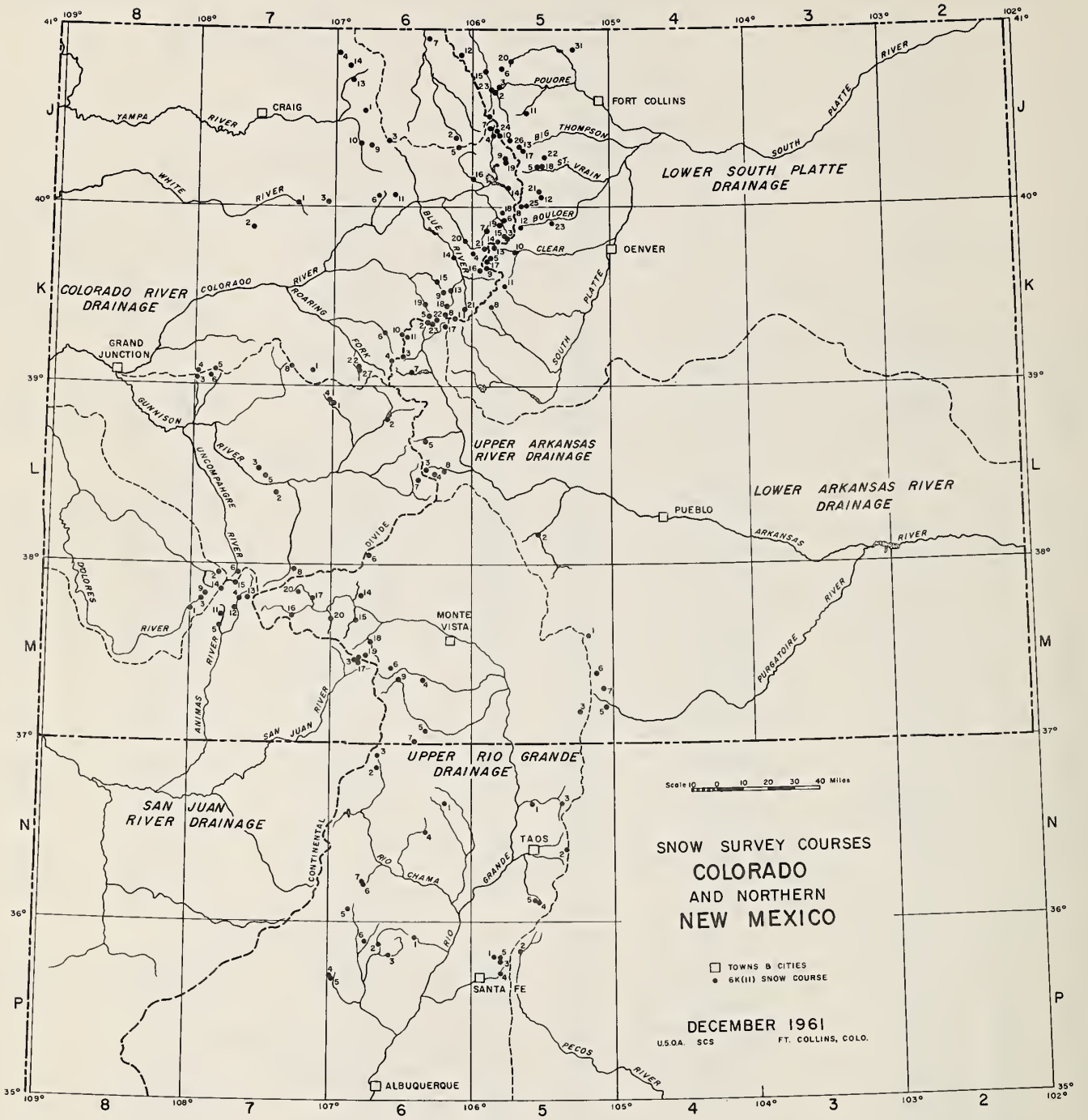
LIST AND LOCATION OF SNOW COURSES AND SOIL MOISTURE STATIONS

No.	State	Name	Sec.	Twp.	Rge.	Elev.
		Gunnison River				
6L1	C	Crested Butte	22	13S	86W	9000
6L2	C	Park Cone	19	14S	82W	9700
7K3	C	Alexander Lake	2	12S	95W	10000
7K4	C	Mesa Lakes	26	11N	95W	
7M6	C	Ironton Park	29	43N	7W	9800
7K6	C	Park Reservoir	34	11S	94W	9500
6L3	C	Porphyry Creek	19	49N	6E	10700
7M8	C	Lake City	13	43N	4W	10300
7K8	C	McClure Pass	1	11S	89W	9500
7M15	C	Red Mountain	13	42N	8W	11000
7L2	C	Blue Mesa	23	48N	5W	8700
6L7	C	Tomichi	30	49N	5E	10500
7L3	C	Long Gulch	2	49N	5½W	9000
7L4	C	Keystone	31	51S	1W	9950
7L5	C	Black Mesa Clim. Sta.	22	49N	5½W	9850
		San Juan River				
6M3	C	Upper San Juan	1	37N	1E	10000
7M5	C	Cascade	13	39N	9W	8850
7M11	C	Spud Mountain	32	40N	8W	10700
7M12	C	Molas Lake	7	40N	7W	10500
7M13	C	Howardville	15	41N	7W	9800
7M14	C	Mineral Creek	35	42N	8W	10300
6M17	C	Wolf Creek Summit	6	37N	2E	11000
7M4	C	Silverton	10	41N	7W	9400
		Dolores River				
7M1	C	Rico	11	39N	11W	8700
7M2	C	Telluride	6	42N	8W	8600
7M3	C	Lizzard Head	24	41N	10W	10300
7M9	C	Trout Lake	8	41N	9W	9700
		Rio Grande (Colorado)				
6M1	C	Wolf Creek Pass	4	37N	2E	10000
7M16	C	Upper Rio Grande	13	40N	4W	9350
6M4	C	Silver Lakes	15	36N	5E	9600
6M5	C	River Springs	25	33N	6E	9300
6M6	C	Summitville	30	37N	4E	11500
6M7	C	Cumbres Pass	17	32N	5E	10000
7M17	C	Santa Maria	8	41N	2W	9700
5M3	C	Culebra	Lat.37°10'	N	105°12'	W 10000
5M1	C	LaVeta Pass	22	28S	70W	9300
6M9	C	Platoro	22	36N	4E	9950
6M14	C	Pool Table Mt.	19	41N	2E	10000
6M15	C	Lake Humphrey	33	40N	1E	9300
6L6	C	Cochetopa Pass	12	45N	3E	10000
7M20	C	Porcupine	2	41N	3W	10400
6M19	C	Hiway	5	37N	2E	10700
6M18	C	Pass Creek	16	38N	2E	9200
6M20	C	Love Lake	6	39N	1W	10000
		Rio Grande (New Mexico)				
5N1	NM	Red River Pass	8	28N	13E	9800
5N2	NM	Taos Canyon	10	25N	15E	9000
5P1	NM	Aspen Grove	12	18N	10E	9100
5N3	NM	Hematite Park	8	28N	15E	9500
5N4	NM	Tres Ritos	23	22N	13E	9000
6N1	NM	Payrole	16	28N	7E	10000
6N2	NM	Chama Divide	Lat.36°52'		106°40'	7750
6N3	NM	Chamita	36°56'		106°40'	8500
5N5	NM	Cordova	22	22N	13E	10100
5P2	NM	Panchuela	27	19N	12E	8300
5P3	NM	Big Tesuque	17	18N	11E	10000
5P4	NM	Elk Cabin	8	17N	11E	8250
5P5	NM	Rio En Medio	8	18N	11E	10400
6P1	NM	Quemazon	34	20N	5E	9300
6N4	NM	Bateman	5	26N	6E	9300
6P2	NM	Fenton Hill	18	19N	3E	8900
6P3	NM	Sandavol	1	18N	3E	9500
6N6	NM	Capuline Peak	17	23N	2E	9000
6N7	NM	Capuline	17	23N	2E	8800
6N5	NM	Bluebird Mesa	5	21N	1E	8775
6P4	NM	Pajarito Peak	20	17N	1W	8700
6P5	NM	Pajarito	20	17N	1W	8450
6P6	NM	Bluebird	8	19N	2E	

No.	State	Name	Sec.	Twp.	Rge.	Elev.
		SOIL MOISTURE STATIONS Colorado and New Mexico				
		North Platte				
6J8-*	C	Muddy Pass	21	5N	82W	9300
6J9-*	C	Willow Pass	30	5N	77W	9400
		South Platte				
6K12-*	C	Alma	13	8S	78W	11400
5K2-*	C	Kenosha	27	7S	75W	10000
5K1-*	C	Hoop Creek	15	3S	75W	10800
5J12-*	C	Alpine Camp	23	1N	73W	9700
5J27-*	C	Guard Station	2	3N	73W	9200
5J28-*	C	Beaver Dam	26	5N	74W	9100
5J26-M	C	Two Mile	22	5N	74W	10300
5J29-*	C	Laramie Road	6	7N	75W	9000
5J30-*	C	Feather	30	10N	73W	8700
5K17-M	C	Clear Creek	33	4S	76W	11200
		Arkansas				
6K16-*	C	Leadville	21	8S	79W	10600
6K24-*	C	Lake Creek	21	11S	82W	10100
6L9-*	C	King	30	49N	5E	10500
6L8-M	C	Garfield	33	50N	6E	9900
		Upper Colorado				
5J16	C	Granby	11	2N	77W	
5K20-*	C	Hairpin	34	2S	75W	9800
5K18-M	C	Ranch Creek	22	1S	75W	9400
5K22-*	C	Vasquez Siphon	9	2S	75W	9600
6K26-*	C	Vail	13	5S	80W	9200
6K15-*	C	Gore	2	1S	82W	8900
6K25-*	C	Maroon	15	10S	85W	8400
6K27	C	Lift	18	11S	84W	
7K7-*	C	Placita	6	11S	88W	8800
6K21-M	C	Blue River	30	7S	77W	10500
		Yampa River				
6J14-M	C	Hahn's Peak	27	10N	85W	8500
		San Juan				
7M14-M	C	Mineral Creek	35	42N	8W	10300
7M12-M	C	Molas Lake	7	40N	7W	10500
7M5-M	C	Cascade	13	39N	9W	8850
		Dolores				
7M3-M	C	Lizzard Head	24	41N	10W	10300
7M1-M	C	Rico	11	39N	11W	8700
8M1-*	C	Dolores	36	38N	15W	7500
		Rio Grande (Colorado)				
5M1-M	C	LaVeta Pass	22	28S	70W	9300
7M4-*	C	Bristol View	26	41N	3W	8800
6M2-*	C	Alberta Park	4	37N	2E	9800
6M8-*	C	Mogote	25	33N	6E	8600
		Rio Grande (New Mexico)				
5N1-M	NM	Red River Summit	8	28N	13E	9800
5N6-*	NM	Aqua Piedra	23	22N	13E	8800
6N3-M	NM	Chamita	Lat.36°56'		106°40'	8500
6N4-M	NM	Bateman	5	26N	6E	9300
5P3-M	NM	Big Tesuque	17	18N	11E	10000
5N2-M	NM	Taos Canyon	10	25N	15E	9000
5P5-M	NM	Rio En Medio	17	18N	11E	10400
6P2-M	NM	Fenton Hill	18	19N	3E	8900

* - Indicates soil moisture station only

M - Indicates soil moisture station on snow course


LOWER SOUTH PLATTE DRAINAGE
COLORADO RIVER DRAINAGE
UPPER ARKANSAS RIVER DRAINAGE
LOWER ARKANSAS RIVER DRAINAGE
UPPER RIO GRANDE DRAINAGE
SAN JUAN RIVER DRAINAGE
CRAIG
FORT COLLINS
DENVER
GRAND JUNCTION
PUEBLO
MONTE VISTA
TAOS
SANTA FE
ALBUQUERQUE
YAMPA RIVER
WHITE RIVER
POUDRE
BIG THOMPSON
ST. VRAIN
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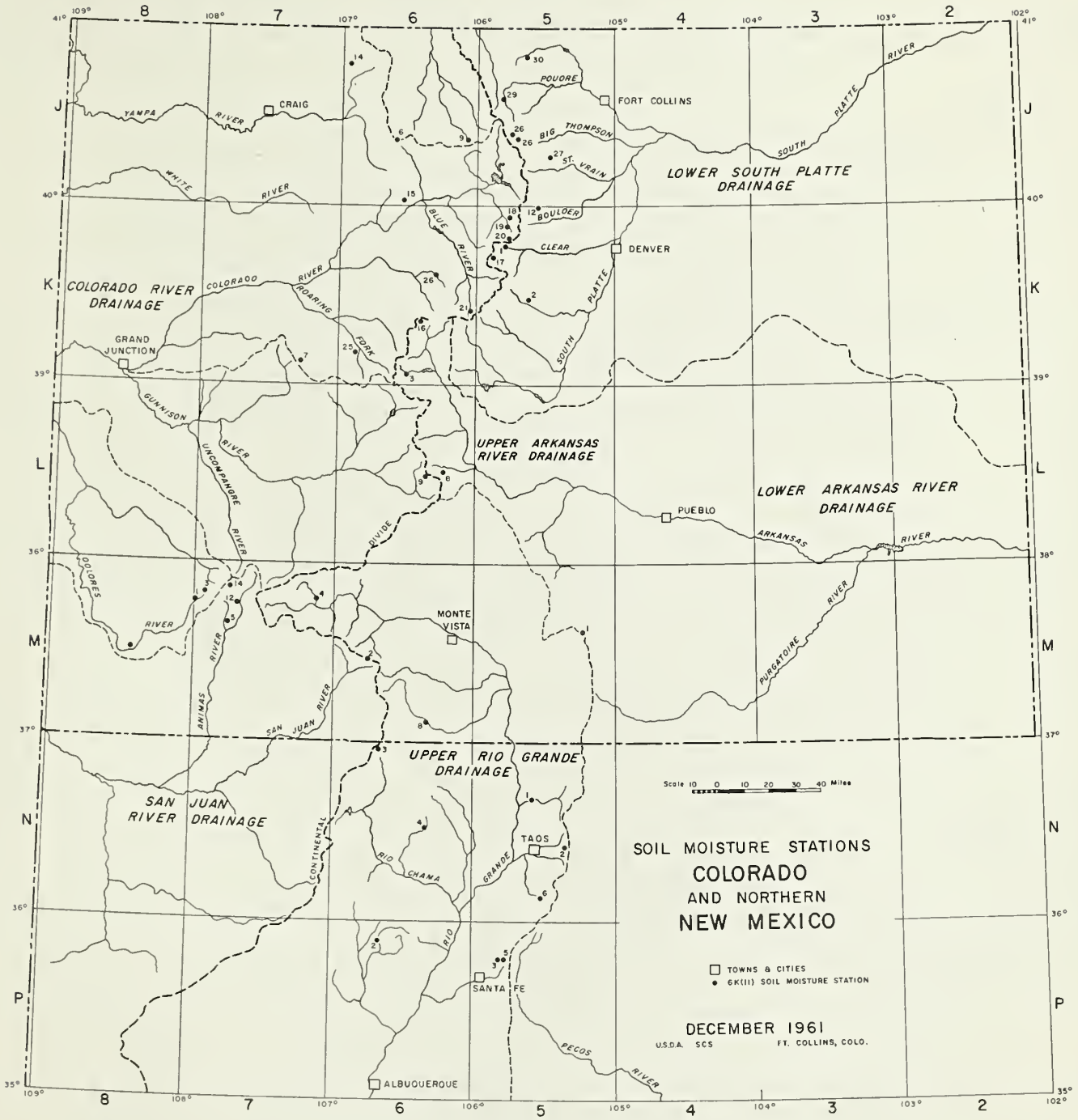
RIO CHAMA
RIO GRANDE
ARKANSAS RIVER
PURGATOIRE RIVER
PECOS RIVER
Scale 10 0 10 20 30 40 Miles
SNOW SURVEY COURSES
COLORADO
AND NORTHERN
NEW MEXICO
TOWNS & CITIES
6K(11) SNOW COURSE
DECEMBER 1961
U.S.D.A. SCS
FT. COLLINS, COLO.

5,P-18,034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CLEAR

5,P-16,035

LIST OF COOPERATORS

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STATE

Colorado State Engineer
New Mexico State Engineer
Nebraska State Engineer
Colorado Experiment Station
Rocky Mountain Forest and Range Experiment Station

FEDERAL

Department of Agriculture

- Forest Service
- Soil Conservation Service

Department of Interior

- Bureau of Reclamation
- Geological Survey
- National Park Service
- Indian Service

Department of Commerce

- Weather Bureau

War Department

- Army Engineer Corps

Atomic Energy Commission

PUBLIC UTILITIES

Colorado Public Service Company
Western Colorado Power Company
Public Service Company of New Mexico

MUNICIPALITIES

City of Denver
City of Boulder

WATER USERS ORGANIZATIONS

Arkansas Valley Ditch Association
Colorado River Water Conservation District

IRRIGATION PROJECTS

Farmers Reservoir and Irrigation Company
San Luis Valley Irrigation District
Santa Maria Reservoir Company
Costilla Land Company
Uncompahgre Valley Water Users' Association
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240 SOUTH HALL
COLORADO STATE UNIVERSITY
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COOPERATIVE SNOW SURVEYS

Furnishes the basic data necessary for forecasting water supply for irrigation, domestic and municipal water supply, hydro-electric power generation , navigation , mining and industry

"The Conservation of Water begins with the Snow Survey"